

THE OCTOBER 1937

25^c

RADIO IN INDEX

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Aerial Construction Data
Tuning Foreign Stations
Shortwave Schedules

No. 112

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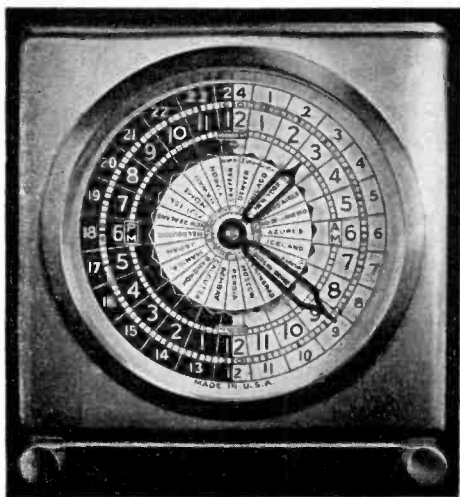
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RADIO INDEX



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FOURTEENTH YEAR

NUMBER 112

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The Radio Codes EXPLAINED

● ● ● For New Dxers.

TUNING a radio set and logging elusive stations is considered as the most thrilling of all hobbies by most of the readers of this magazine, but there must be a large number of fans who are not deriving the fullest possible amount of pleasure from their sets, if we are to judge by a pile of letters that has accumulated during the past year.

A large portion of our mail consists of questions from readers who have just started to tune and who want to know what a kilocycle or GMT might be. All such queries are answered direct, but for the benefit of the dial twisters who have similar questions in their minds, we publish, once a year, an article designed to answer all these and similar questions.

While the design of the modern radio receiver is such that no previous experience or special skill is required for its proper operation, its full possibilities can be realized only by those who are familiar with the general characteristics of transmission on the higher frequencies. It should be understood that short-wave reception is not governed by fixed laws of nature but rather by flexible conditions over which man has no control, and that there can be no hard and fast rules for short-wave tuning. Nevertheless, certain general results have been observed, the most common observation being the condition known as "skip distance."

Transmitted signals of any wavelength are known to divide into two components, the "ground" wave and the "sky" wave. The former remains close to the earth's surface and provides reliable service only

over short distances from the broadcasting stations. The sky wave, however, travels into the higher layers of the atmosphere and is reflected back to the earth's surface at a considerable distance from the station. With shortwave signals the sky wave does not return within the area covered by the ground wave, and the region between the area covered by the ground wave and that covered by the sky wave is known as the skip distance, a dead-spot region within which reception is impossible or unsatisfactory.

Reception on six megacycles is most reliable when received from a distance of 300 miles or more, although good reception at much greater distances can be expected



Finis Barton, young Australian actress, has appeared in "Columbia Workshop" dramatizations over the CBS. Prior to entering the broadcasting field she was engaged in Shakespearean stock company presentations on the Pacific Coast.

when a large part or all of the path of transmission lies in darkness.

Stations near 9.5 megs. are most reliable when heard over distances greater than 800 miles. Good reception from distant stations in this band is possible both in the daytime and at night.

Stations at a distance of 1000 miles or more from the receiver come in well near 11 megs. This band is best during daylight hours but distant stations can be heard sometimes until midnight, especially in the summer time.

Around the 15 megacycle band stations situated at a distance of 1500 miles or greater will be found most satisfactory. These signals are generally heard in the daytime, but in the summer this band stays "open" until nearly midnight.

Wavelengths—Frequencies

The energy radiated from a radio station is emitted in the form of waves, similar to the ripples produced when a stone is thrown into a body of water. Each ripple is called a "wave" and the size of each ripple is called the "wavelength." Wavelengths are always measured in meters. Therefore, when a station is said to transmit on 200 meters, it is meant that each wavelength produced by that station is 200 meters long.

It is generally more convenient to classify stations by frequencies rather than by wavelengths. The number of times that a complete wave is produced within one second is the station's frequency. Frequencies are measured in kilocycles. A station that is operating on a frequency of 9000 kilocycles per second, is radiating 9000 complete wave forms within a second.

A megacycle is 1000 kilocycles. A frequency of 9000 kilocycles is equal to a frequency of 9 megacycles.

The abbreviations for these various forms of measurement are, the

Greek letter "L" (similar to an inverted Y) for wavelength. "Kcs." for "kilocycles per second." "Megs." for "megacycles per second."

In the RADEX shortwave indices, frequencies are given in megacycles per second. To convert these to kilocycles, change the period to a comma. Hence, 6.130 megs equals 6,130 kcs.

Power

The amount of power that a station uses is measured in watts. Stations with high power use the unit "kilowatt" (abbreviated kW) which is equal to 1000 watts.

Time

The 24-hour clock is used to indicate time in the RADEX indices. This system of indicating time is not at all complicated—instead of dividing the day into two twelve hour divisions, a. m. for the first section and p. m. for the second, the day is considered as 24 hours long, from midnight to midnight. The day commences at midnight, which is indicated by four cyphers (0000), and continues to the next midnight, which is 2400. Four digits are always shown, the first two digits representing hours and the last two digits, minutes. Thus, 1 a. m. is written 0100, 2 a. m. is 0200, 4:30 a. m. is 0430, etc. Noon is 1200 and 1 p. m. is 1300; 11 p. m. is 2300 and midnight is 2400 or 0000.

This may seem a bit confusing at first, but soon it becomes quite natural to think of 2 p. m. as 1400 or 10 p. m. as 2200.

Greenwich Mean Time (GMT) is the sun time at Greenwich, England, and has been universally adopted as International Time. The time at nearly every locality in the world is calculated to agree with GMT in minutes and seconds, but to differ in hours by whole numbers. As an example, the true sun time of New York City is 4 hours 56 min-

utes slower than Greenwich, but the standard time differs by exactly five hours.

Greenwich Mean Time is universally understood and local time should be converted to GMT when writing to foreign stations for verifications.

A Time Conversion Table is printed every month in RADEX, showing EST by the 24-hour clock, GMT, and a third time zone which is changed every month. Last month this was EST by the 12-hour clock; this month we show Central Standard Time and next month Mountain Standard Time will be shown in the table.

Radio Districts

The United States is divided into nine districts, and the district in which an amateur or experimental station is located is shown by the number which follows the W— or K— prefix. The districts are divided as follows:

First District (W1—) includes the states of Connecticut, Maine, Massachusetts, New Hampshire, Rhode Island and Vermont.

Second District (W2—)—includes, in the State of New York, the counties of Albany, Long Island, New York, Rensselaer, Schenectady and Staten Island, and, in the State of New Jersey, the counties of Bergen, Essex, Hudson, Middlesex, Monmouth, Ocean, Passaic and Union.

Third District (W3—) includes the States of Delaware, Maryland, Virginia, and the District of Columbia. In New Jersey, all the counties not included in the Second District, and in Pennsylvania, all the counties south of the Blue Mountains.

Fourth District (W4—) includes the States of Alabama, Florida, Georgia, North Carolina, South Carolina and Tennessee.

Fifth District (W5—) includes the States of Arkansas, Louisiana, Mis-

issippi, New Mexico, Oklahoma and Texas.

Sixth District (W6—) includes the States of Arizona, California, Nevada and Utah.

Seventh District (W7—) includes the States of Idaho, Montana, Oregon, Washington and Wyoming.

Eighth District (W8—) includes the States of Ohio and West Virginia, all the counties in New York not in the Second District, all the counties in Pennsylvania not in the Third District, and the Lower Peninsula of Michigan.

Ninth District (W9—) includes the States of Colorado, Illinois, Indiana, Iowa, Kansas, Kentucky, Minnesota, Missouri, Nebraska, North Dakota, South Dakota, Wisconsin, and the Upper Peninsula of Michigan.

K4 includes Puerto Rico and the Virgin Islands.

K5 includes the Canal Zone.

K6 includes Guam, Hawaii and Samoa.

K7 includes Alaska.

International Prefixes

All the radio-using countries in the world are assigned, by International Treaty, a letter or a set of letters to be used as the initial letter in their call signs. A complete list of the International Prefixes will be given in RADEX next month, but here we give a short list of the most common assignments.

The letters K, N and W are assigned to the United States. Gt. Britain has the letter G, Germany uses D, Italy has I, Japan has J and the letter F is used by France. All the other countries use groups of letters, as, for example, Mexico, China and Burma share the letter X, and Colombia, Haiti, Dominican Republic, Vatican State, Siam and others share the letter H. Watch for the complete list to appear next month.

The Spanish Alphabet

Familiarity with the pronunciations of the letters of the Spanish

alphabet is essential if one is to identify the large number of Spanish-speaking stations on the air. It is given below:

A, Ah	N, En-nay
B, Bay	O, Oh
C, Say or thay	P, Pay
D, Day	Q, Koo
E, Ay	R, Air-ray
F, Ef-fay	S, Ess-say
G, Hay	T, Tay
H, Ah-chay	U, Oo
I, Ee	V, Vay
J, Ho-tah	W, Doo-ble-vay
K, Kah	X, eckis; ay-kis; ek-key
L, El-lay	Y, Yay
M, m-may	Z, Zed.

These pronunciations are given the way they sound on the radio and may not agree with Spanish textbooks. Slightly different accents are heard in different countries, which accounts for the difference in pronunciation of some of the letters.

The Spanish numerals, also very important, are given below:

One, Oo-no	Six, sase
Two, Dose	Seven, Sate
Three, Trace	Eight, Oh-cho
Four, Koo-ah'trow	Nine, Noo-ay-ve
Five, Theeng-ko	Ten, Diez

Amateur Lingo

Radio amateurs have a lingo all their own and anyone who listens in very much should become familiar with some of the expressions used, such as "OM", meaning "Old man," or "YL," meaning "Young Lady." Amateurs must be good diplomats because every feminine operator is a "young lady" regardless of her age. An amateur's wife is his "XYL."

The most common term heard is "CQ," which is a general call to any station. "73" is the ham's way of saying "best regards" and "vy 73" is "very best regards."

To save the trouble of sending a

lot of dots and dashes many words are shortened in code transmission, and these short forms are often seen in print. A few samples are "xmitter," "xmission," "xtal" for transmitter, transmission and crystal respectively. "DX," is a shortened form for "distance." The word "schedule" is often spelled "sked."

Your is "ur." Thanks is "tnx." Good is "gud." From is "de." And is "es." The letters "FB" mean "fine business," or, in other words, "very good," as a "FB receiver." "Hi" is a laugh in code. The seldom-heard "88" means "love and kisses."

An operator is an "op." His typewriter is a "mill." His transmitter is "junk" or a "rig." The aerial is a "Sky wire" and the aerial poles are "sticks." His hand is his "fist."

A QSO is communication between two stations.

A QSL is an acknowledgement, as a QSL card, which verifies reception of a transmission.

"CUL" means "See you later," and "CU agn" means "See you again."

A QRA is a station's address.

CW means "continuous wave" and ICW stands for "interrupted continuous wave." CW and ICW are two forms of code transmission.

Commercial operators use the symbol A1 for continuous wave, A2 for interrupted continuous wave, and A3 for voice emission. Condition "A" is inverted modulation or "scrambled speech," and Condition "B" is intelligible speech.

QSA and R Codes

The R code describes the volume with which a signal is heard.

R1 is a signal that is barely perceptible.

R2 is a very weak signal.

R3 is a weak signal.

R4 are signals of fair volume.

R5 are fairly good signals.

R6 are good signals.

R7 are moderately strong signals.

R8 are strong signals.

R9 are extremely strong signals.

The QSA Code is used to describe the understandability of a station's signal.

QSA1 is a signal that is unreadable.
QSA2 is one that is barely perceptible. A word can be understood now and then.
QSA3 is understandable with difficulty.
QSA4 is a signal that can be understood with practically no difficulty.
QSA5 is perfectly understandable.

Some persons describe radio signals further by employing the S and X symbols, S to indicate fading and X to indicate static, in this manner:

S is slight fading.
SS is deep fading.
SSS is a complete fadeout.
R is rapid fading (fluttering).
X is slight static.
XX is bad static.
XXX is very heavy static.
The letter N indicates that either fading or static was not present.

These symbols are written like this:

- (a) QSA5, R7/S/XX
- (b) QSA4, R7/N/N

Example (a) means that the station had a perfectly understandable signal at moderately strong volume, with slight fading and bad static. Example (b) means the station was easily understandable at quite strong volume, no fading and no static being present.

Reply Coupons

When writing to foreign stations, an International Reply Coupon should be sent to pay return postage; pennies or stamps should never be sent because they are no good outside our own country. Reply Coupons cost nine cents each and can be purchased at any post office.

When buying Coupons be sure they are properly stamped. The postmark should be applied to the left side of the Coupon, above the words *Timbre du Bureau d'Origine*. They are void if not correctly stamped.

Arthur Godfrey, popular announcer, owns every modern means of conveyance except a locomotive engine.

Antenna Wrinkle

By Carrol Weyrich

DURING the summer I have been doing a little experimenting with antennas. Out of curiosity an eight foot antenna of the type which is used on automobiles was purchased, just to see what it would do on a regular home set. The results have been very satisfactory.

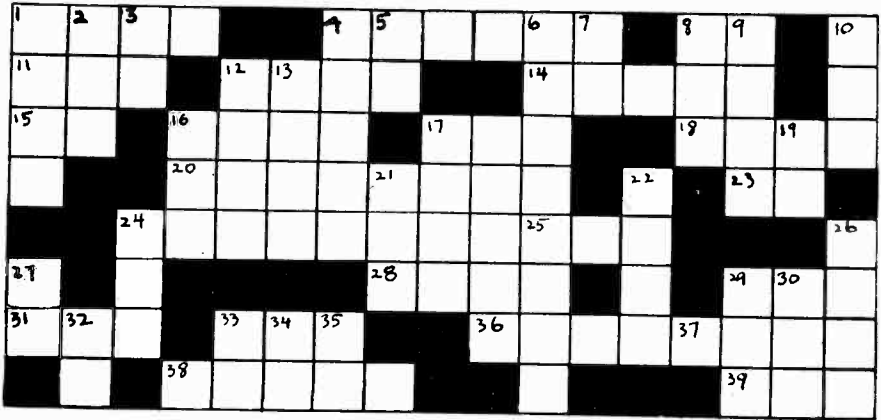
I also have an inverted L type aerial 45 feet long, running east and west. Using a 1938 Hallicrafters Super Skyrider, which is equipped with an R meter, I have made tests switching from one aerial to the other, and have found that the 8-foot vertical increased signal strength anywhere from 1 to 3 R units, both on the broadcast band and shortwaves.

I can recommend this type aerial to anyone who has no facilities for erecting a long antenna, and am sure they will receive results at least equal to my own. I have found the vertical so much superior that I am now using it exclusively.

The reason for this unusual performance, I can attribute only to the fact that the aerial is non-directional, and perhaps the additional fact that it has more surface than a strand of wire.

The Department of Transport, Ottawa, announces the addition of a new station. It is CHLT, located at Sherbrooke, Quebec, and works on 1210 kcs. with 100 watts. The licensee is La Tribune, Ltd.

Two DXers "Down Under" desire to exchange their SWL cards for yours. They are Ron Daniels, 95 Fargo St., Bundaberg, Qsld., Australia, and G. M. Anselme, 16 Hartley St., Rozelle, NSW, Australia.



The RADEX CALL-O-GRAM

● ● ● By Lloyd J. French

Horizontal

1. Wonderful North Carolina.
4. Make of radio.
8. Symbol of the Mystic Knights of the Dial.
11. Owned by McClatchey Newspapers.
12. We Kill Blues Instantly.
14. The Pine Tree State.
15. Canadian Province (abbr.).
16. Former call for WCOL.
17. In St. Louis.
18. Bridgeport (reversed).
20. Read this when you have finished.
23. Western State (abbr.).
24. Same as 20.
28. Deleted Canadian Nat'l. Railway's station in Ottawa.
29. 900 kcs. In the 46th State.
31. Has a sister station on 1180.
33. F.D.R. probably listens to this.
36. In western Florida.

37. Quebec on 960.
38. In South America.
39. On 760.

Vertical

1. Kansas on 1370.
2. NBC Red in Memphis.
3. A State (abbr.).
5. Laughter.
6. In Santiago, Cuba.
7. Identifies Peru.
8. N. C. at Duke University (last 3 letters).
9. One of two 10 watters in Mexico.
10. On 760.
12. Shares with WCBA.
13. Checks 2nd Thurs. at 5 a.m.
16. Formerly synchronized with WOC.
17. Arkansas on 1500.
19. Preposition.
21. This rules the air waves.
22. Texan formerly on 1290.
24. Cuban—third most powerful.
25. Cuban on s.w., relays CMQ.
26. KPJM used to be where this one is now.
27. Twenty-five stations begin this way.
29. Broadcasts all games of the Indians.
30. The Voice of Paramount Pictures.
32. Southern State (abbr.).
34. Inaudible.
35. Middle letters of Enid, Okla. call.

Special Program From WJBO

Mr. Wilbur T. Golson, Chief Engineer of WJBO, Baton Rouge, La. informs us that WJBO will transmit special programs on the first and fourth Sunday morning of every month from 2 to 4 EST. The first hour of each broadcast will be presented from the studios located at the campus of the Louisiana State University, with an all-student cast of entertainers from the School of Broadcasting. The second hour of

the broadcasts will be conducted by Mr. Golson, with DX News, answers to DX mail and musical selections requested by DXers.

WJBO is now working on its new frequency of 1120 kilocycles with 500 watts power.

Former stenographers who have made good on the air are Betty Caine, star of "A Tale of Today"; Lucille Manners, Carol Deis, and Dorothy Lamour.

Overseas BROADCASTING Notes

RECENT revisions in the Australian stations are given below:

960 kcs, 5DN, Hume Broadcasters, Ltd., Adelaide, increased power to 500 w. Station 5KA of the Sport Radio Brdcstg. Co., Ltd., Richards Bldgs., Currie St., Adelaide, transmitting on 1200 kcs, boosted its power to 500 watts. 5AD on 1310, Advertiser Newspapers, Ltd., Weymouth St., Adelaide, also jumped to 500 watts.

Changes in Ownership: 6AM of Northam, 980 kcs., has been acquired by the 6AM Brdcsters., Ltd., St. George's Terrace, Perth. 3YB of Warrnambool, 1210 kcs., was taken over by the Argus Brdcstg. Services, Pty., Ltd., and the same firm has also acquired 3SR, Shepparton, on 1260 kcs. The Irrigation Area Newspapers, Ltd. have purchased 2RG, Griffith, on 1470 kcs.

7HT, 1080 kcs., Metropolitan Broadcasters, 44 Elizabeth St., Hobart, Tas., shifted its frequency from 1330. This station's transmitter is situated at Rosny Hill. 3SH, Swan Hill Brdcstg. Co., Campbell St., Swan Hill, moved from 1130 to 1330 kcs. 4WK, Warwick Brdcstg. Co., King and Albion Sts., Warwick, moved from 1360 to 1340 kcs.

The Australian Broadcasting Co., Ltd., now has a network of twelve stations in three states in Australia. This network is now in operation. The twelve member-stations are as follows:

Sydney, NSW, 2UW
Wagga, NSW, 2WG
Melbourne, Vic., 3UZ
Shepparton, Vic., 3SR
Warrnambool, Vic., 3YB
Warragul, Vic., 3UL
Brisbane, Qsld., 4VC
Maryborough, Qsld., 4MB
Rockhampton, Qsld., 4RC

Toowoomba, Qsld., 4GR
Kingaroy, Qsld., 4SB (under construction).

Roma, Qsld., 4ZR.

Of this group, the Commonwealth Broadcasting Corp. owns or controls seven and the Nilsen's Broadcasting Service, Pty., Ltd., owns four.

Station 7ZL at Hobart, Tas., is wandering around the dial again. It has shifted from 620 to 680, then finally to 650 kcs. As this happens to be the frequency used by 1YA in Wellington, reception of 1YA has been ruined in parts of New Zealand.

The new Australian station 6PM was opened on April 22nd this year. 2PM is operated by 6AM and 6PM Broadcasters, Ltd., and is situated on the eastern boundary of Fremantle, only 7½ miles from Perth. The frequency is 1390 kcs and 100 watts power is radiated.

New Australian stations on the air, according to information direct from the Postmaster-General's Department, are 2CR, Central Regional station at Cumnock, NSW, on 550 kcs with 10 kw in the aerial, and 7QT, Queenstown, Tasmania on 900 kcs with only 100 watts. 7QT is owned by the West Coast Broadcasters, Pty., Ltd., 21 Paterson St., Launceston, Tas.

In New Zealand

Alan Hutchinson, 15 Embo St., Dunedin, N. Z., reports five new stations on the air. They are 2CR, Cumnock, NSW., 550 kcs; 2YD Wellington, 990 kcs; 3UL Warragul, Vic., 1000 kcs; 7HT Hobart, Tas., 1080 kcs., and 2ZB Wellington, 1120 kcs.

According to a writer in the New Zealand Radio Record, the operators of the new 2YD in Wellington must have been listening to KFI Los Angeles, because the N. Z. station is specializing in light drama,

variety, thrills, rhythm, new features and new personalities. And, instead of the usual dignified announcements, 2YD will have snappy announcements. 2YD was opened on Sunday, April 25, and transmits on 990 kcs. from 7 to 10 pm nightly, NZ Time (2:30 to 5.30 am EST).

"The government is now attempting to take over all the B stations but four of the locals, 4ZB, 4ZO, 4ZM and 4ZL have refused to sell at the price offered," reports A. I. Breen of Dunedin. Mr. Breen states that they will not be forced to sell unless they are satisfied, so the position is still quite indefinite. He says he has reason to believe, however, that 4ZR at Balclutha will sell and close down shortly, and that 4ZL in Dunedin will most likely also disappear. 3ZM was one of the stations sold, and was deleted as of August 1st. At that time the new commercial station 3ZB came on the air.

Contrary to former notices, 2YB at New Plymouth, will remain on 760 kcs and not shift to 1060.

The New Zealand government has announced a new station of 5 kw capacity will be erected in Hawkes Bay and Southland.

In China

Recent revisions in Chinese stations have been brought to our attention by Mr. A. I. Breen of Dunedin, New Zealand. XLJA, Nanchang, 1430 kcs with 20 watts is one of the new broadcasters. Others are: XOCL, Tsinan, 1500 kcs., 150 watts; XGOM, Tientsin, 730 kcs., 15 watts; XGOY, Kunming, works on 7500 kcs with 100 watts during the day only and on 776 kcs with 250 watts at night.

XLHM at Shanghai on 1480 kcs transmits with 50 watts from midnight until noon, from 7 to 9 pm and from 11 pm to midnight, EST.

XLHG, Shanghai on 800 kcs works from 6 to 11:15 p.m EST daily with 100 watts.

XGOV in Changsha is now on 790



Walter and Irene Wicker, one of radio's most successful husband-and-wife combinations, offer living proof that marriage and careers may be mingled without harm to either. Irene is best known as NBC's Singing Lady, while Walter acts, writes and produces. He is co-author and a member of the cast of Today's Children.

kcs with 10,000 watts power. The operating hours are 10:30 pm to midnight and 4 am to 10 am, EST.

XGOF in Tsinan on 805 transmits with 500 watts from 7 to 11 pm and 5:30 to 11 am, EST.

A "powerful little 5-watter," XGKE, is now on the air on 1000 kcs. This Nanchang station transmits from the same location as 300 watt XGOC on 1130 kcs. It is not expected that XGKE will blast our loudspeakers this winter, but we are keen to report *all* the news and our Chinese readers at least will be glad to have it.

In South America

A new Uruguayan station, known as "Radio el Mundo," CX38, is now transmitting on 1290. The studios are located at Ibicuy 1285, Montevideo.

CX42, also in Montevideo, has changed its name to "Tribuna Son-

ora." The frequency of 1370 and the address, Av. Italia 3646, remain the same.

LRA, Radio Municipal, Buenos Aires, was officially opened on July 6. LS11, Radio Provincia de Buenos Aires, is planning to replace its present transmitter with German-built equipment of the same type as used by DJA, DJB, etc. LR2 will increase its power to 125 kw., using new Philips units to be brought from the Netherlands. LR3 commenced on July 9 to relay their programs over shortwave stations in Colonia, Uruguay, and the programs of LR2 will be heard through CXA2 in Montevideo. Our South American reporter believes, however, that the Argentine government will find these shortwave rebroadcasts illegal and they may be terminated.

Most of the Brazilian stations have boosted power, the most important being the following:

The station at Joao Pessoa on 640 kcs., to 10 kw.; PRA4, 1090, 10 kw; PRA5, 1260, 5 kw; PRA8, 730, to 25 kw; PRB7, 900, 5 kw; PRC2, 680, to 5 kw; PRC5, 670, to 2 kw; PRC8, 1360, 5 kw; PRE2, 1430, 5 kw; PRE4, 1340, 5 kw; PRE8, 980, 20 kw; PRE9, 1320, 2 kw; PRG3, 1280, 25 kw; PRG9, 1100, 20 kw; PRH3, 1160, 5 kw; PRH4, 1320, 2 kw; PRH6, 1300, 3 kw; PRH9, 840, 5 kw; and PRI3, 880, to 22 kw.

New stations for Chile are either under construction or already in operation on 630, 680, 730, 960, 1270, 1330 and 1500 kcs. On 630 is CA63, Iquique, a 250 watt station owned by Antonio Cajiao. Known as "La Voz del Norte," its studios and transmitter are located at Cavan-cha.

CB68 on 680 kcs, is now on the air. Situated at Valparaiso, this one kilowatt job, known as "Metro," is owned by Renard y Garcia, Tello. CB73 at Santiago is also on the air,

(Please turn to Page 48)

Universal DX

Club Corner

● ● ● By "Pooky"



YOU know, friends, material of strictly secondary importance like this column, must be submitted to RADEX a full month before publication. As this is being written, the September issue of RADEX, containing the grand announcement of the UDXC Mysterious Contest, has not appeared on the stands! For this once, we have really a good excuse for the lack of entries.

In these straits we appealed to some of our members to help us out and Mr. Floyd L. Hammond, Pleasant Street, Dexter, Maine, turned up with a very creditable little article. We print it below, first because we think you'll be interested in it, and secondly because it's a good example of the kind of thing that will win our Eight Mysterious Prizes away from us. The article is not eligible for a prize, and we want particularly to thank Floyd for his kindness. If you don't agree with Floyd's conclusions—friends, you have no excuse for not writing a refutation of them and entering it in the contest.

Address entries, queries, suicide notes: "Pooky", UDXC Headquarters, 345 Maple Avenue, Oradell, New Jersey.

A PLEA FOR THE VERTICAL ANTENNA

"Lately the Vertical Antenna seems to have been discarded in favor of more elaborate and expensive

antennas. Someone has sold us on the idea of the doublets and double-doublets (Pooky says: a fellow up in Ontario has even experimented successfully with quintuplets) and we seem to have forgotten how much can be done with a single straight vertical wire. It has advantages that no other aerial can have.

"The Vertical Antenna in my opinion is inherently less noisy than almost any other type of aerial, especially in crowded locations. I do not say that it raises the signal level (the theorists claim that it lowers it slightly) but I do say emphatically that it lowers the noise level a great deal, and that, practically, is the same thing. Suppose, for instance, that you are listening to the radio while your XYL is vacuuming the living-room rug; when she turns off her vacuum cleaner your signals seem to be twice as loud and clear as before, although there has been no change in their actual strength. The Vertical Antenna, by virtue of its design and without benefit of shielding or gadgets, reduces noise and so improves reception.

"The Vertical Antenna has one other advantage that in some locations makes it worth all the others put together, and that is the fact that it takes up almost no room. A Vertical Antenna 30 ft. high is more than the equal of an Inverted L 30 ft. long and you need only a few square inches of surface to erect it.

Think that over, you fellows in apartment houses in the city, where the roofs are a maze of wires. If you put up any other kind of aerial it will be severely limited in length and in direction, and every other aerial on the roof will be dumping interference onto it. If you put up a Vertical Antenna you will have all the room you can possibly use, all to yourself. Literally, the sky's the limit.

"I recommend a single stout pole 30 to 35 ft. high, erected securely on the roof. At the top of this you should place (Pooky says: beforehand) a horizontal arm about four feet in length, projecting from the pole at right angles. The aerial wire is simply suspended from an insulator at the end of the horizontal arm and run down to your set. Run it directly as possible, with as few bends as possible. Don't have it come to your set at a gradual angle, as this tends to destroy the noise-free effect. Keep it at least three feet away from the wall and all large objects as long as possible. In an apartment house you should be able to erect the pole on the edge of the roof with the arm projecting over the wall directly above your radio. This aerial is non-directional, of course.

"I think I have tried them all, all the formulas and all the gadgets, and I will stack the old Vertical up against any of them, particularly in the city. It is a simple, logical antenna that gives you the results you pay for and don't get in the elaborate and complicated commercial models. (Pooky says: Floyd, you don't mean the Philco aerial we're giving as one of the prizes!) (Floyd says: yes, I do!) (Pooky says: aw, shucks! — well anyhow, thanks, OM.)"

Three Canadian stations have increased power, according to the Dept. of Transport at Ottawa. CKCK, the Leader-Post, Ltd., Regina, Sask., working on 1010 kcs., is now using 1000 watts. The Manitoba Telephone System station at Brandon, CKX, increased to 1000 watts on 1120 kcs. CFCF in Montreal, The Candian Marconi Co., increased from 400 to 500 watts.

Our Readers Ask About AERIALS

• • • By The Technical Editor

Indoor Antenna

I HAVE a General Electric, model A-83 receiver with 8 metal tubes, and wish to use this in my home with an inside antenna. Will you please tell me how the best type of indoor aerial can be constructed?

While a set of the above type will pick up radio signals with almost no antenna, because of its sensitivity, a good aerial is half the pleasure of owning a set. In our opinion, the best antenna is that which is erected outdoors, as high as practicable, and of the correct length to provide resonance over the major important wave bands. This, in effect, calls for an aerial of the noise-reducing type, such as the doublet or newer straight-line kinds.

All this, however, does not preclude the use of a good indoor antenna. Indeed excellent results have been obtained simply by using a small wire surface within the home—a bed spring, for instance, or a window screen. If the house has a good open attic, so much the better. It is not wise to attempt the erection of a doublet antenna in the attic. The length necessary to stretch out the two wires is not available. Instead of this, an antenna, such as the new RCA Magic Wave, can be utilized in an attic because its length of wire may be stretched around two or three sides of the attic walls under the roof. However, much of the effect is lost if the roof is metallic. These antennas use coupling transformers at the upper and lower ends of the leadin wires, and tend to eliminate much of the electrical and static noises picked up within the home. The leadin wires can be run to any point in the house regardless of distance.

A simple type of "L" antenna, in which the leadin wire also figures as length, is to stretch a single wire diagonally across the attic, so as to get it as long as possible, and continue one end of it down to the radio set. This provides a single wire of one length, and it is wise to cut this total wire to a length that is equal to one half of the length (in meters) of the most used short-wave band on the receiver. There is little difference in the relationship between antenna length and wave length when the ordinary broadcast band is used. Other indoor antennas may consist of wires looped around a room, under the rug or carpet or attached to picture moulding. A new type, more limited in its scope, is the telescopic whip antenna having a maximum height of about 8 feet. The insulator base is attached to the window sill outdoors, and the aerial rod or "whip" is projected out from the window at an angle that is adjusted experimentally until best reception is noted. One example of this type is the new ICA (Insuline Corp. of America) "Windo-Pole" aerial. It solves the antenna problem in homes and apartments where it is inconvenient to install roof or indoor antennas, and is quite efficient for both short-wave and standard broadcast reception.

Separate Antennas

My receiver has 11 tubes and seems very satisfactory. But my aerial is an ordinary "L" type with leadin about 38 feet in length. The flat top portion is horizontal, about 49 feet long, and is supported between poles a distance of 47 feet above the ground. The set has four wave bands in the short-wave section—1.5 to 3.6, 3.6 to 7.2, 7.2 to 14.0,

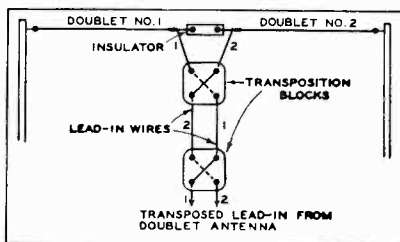
and 14.0 to 22.5 megacycles, respectively. Can you tell me the length of the flat top antenna that will be best for these bands and using a leadin of 38 to 40 feet? Can I use two aeriels with a switch in the house so as to obtain maximum efficiency?

We do not lean favorably toward the "L" type of antenna when there is sufficient outdoor space to erect an aerial of some different kind. While the "L" antenna is quite directional, provided the leadin is very short, it should be remembered that the leadin wires of this system are important since they pick up signals just the same as the flat-top portion overhead. This, then always makes it difficult to consider antenna length when an "L" type is to be designed to operate efficiently over all the short-wave bands incorporated in the set.

The Radio Corporation of America has recently developed a new "L" type antenna, and the length of the flat top may be varied from 20 to 120 feet to suit the space available. The lead in wire can also be varied to suit. This is an innovation in antenna design, and is made possible by a system of antenna and set-matching transformers. These make it possible to match the leadin to the antenna and then to the receiver, so that losses will be at a minimum. This aerial covers the entire all-wave band equally well from 530 to 23,000 kilocycles, embracing your requirements.

It is known that the length of antenna bears a direct relationship to the length of the waves picked up. An aerial that is cut to one half the length of the wave to be picked up intercepts a maximum amount of energy, but we cannot have a lot of wires of different lengths for all portions of the wave bands on the dial. If we utilize a double-doublet, such as the one designed some time ago by RCA, we reach a happy medium.

This is particularly true on the shorter waves; the broadcast band not being so critical. Also, good response will be obtained at some of the harmonics or multiples of the waves being received. A doublet having a total length of 60 feet (two halves each of 30 feet), will respond well to signals having a wave length of 120 feet or about 31 meters. But in the 19 megacycle band this antenna will give only weak signals, for then its total length should be approximately 40 feet. The double-doublet has two antennas, one with an over-all length of 58 feet and one with a total length of 33 feet. The shorter antenna is erected under the longer. Both are specially connected together and to the leadin line. A set-matching transformer is used at the lower end of the transmission line

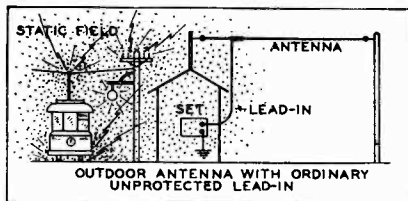


to match the impedances of the two. This transformer covers a range from 540 to 18,000 kilocycles. The transmission line is 80 feet long and must not be cut. Any excess line is coiled up behind the radio, and if more is required an additional 80-foot line must be attached. If you desire to erect separate antennas for each of the wave bands, compute the average for each band in meters, divide by two and erect antennas of these different lengths. This is not entirely satisfactory unless you use doublets with twisted transmission lines carefully matched to the input impedance of the receiver.

Railroad Interference

My home is between an electric car line and a railroad. Over the house is a power line that runs heavy machinery in a nearby shop. I can erect my antenna about 50 feet in the air, above the railroad lines with a long lead-in wire. How can I get away from this interference so I can pick up some of the short waves and get better reception?

The widespread popularity of short waves and the fact that these signals usually come from great distances and have become weakened, brings out the fact that man-made interference is a problem of the first magnitude. How to eliminate this noise and static is holding the attention of radio's greatest minds. Noise reducing aerials with lead-ins that do not pick up local interference seem so far the only solution. When one is placed in a spot such as yours, the problem becomes doubly acute, and surely you have the sympathy of a legion of short-wave fans. Perhaps there will be many who will tell you how they solved some similar situation.



We think that a good doublet antenna, erected as high as practicable, and *parallel* to the wires that give off the interfering static waves, together with the best transmission line that you can procure, will be your best attempt to overcome the trouble. If you use a single wire antenna, such as an "L" or "T" type, you must then erect it *across*, or at right angles to, the power lines. It is well to use a special

down lead, such as the Lynch "Giant Killer" transmission line, and which we can recommend as excellent for the purpose. The new RCA antenna, mentioned elsewhere in these answers, is worthy of study in your case.

Any remaining trouble is in the flat-top portion of the antenna. Here the interfering signals are picked up along with the radio waves. There is little that can be done to prevent it, unless the wires are erected as high and far away as possible from the static sources. The length of lead-in is of little concern, for you can use up to 300 feet, without appreciable loss of energy. If you are sure that the interference reaches the set through the antenna, then a study of aerials is in order. However, some noise may come to you through the wiring of the home which also acts as an aerial and picks up stray electrical waves and carries them into your receiver. In this case it will be well to consider a good type of power-line noise filter, such as a small Tobe model.

When you erect the antenna use two or three good glass insulators between its supports and the end of the doublet wires, placing about 6 inches of wire between insulators. This is important if your supports happen to be made of pipe. It is possible for nearby metal to re-radiate interference waves to the adjacent antenna wires. A ground lead too can cause trouble, and frequently outside interference is reduced by removing the ground wire entirely and depending upon the doublet lead-in only. If you can construct a ground by driving one or two 6-foot lengths of new ½-inch pipe down into moist earth at least 10 feet or more from any gas or water pipes, and connect together with heavy copper wire, well soldered, you will improve your ground and find it less noisy. This, of course, in case your set needs a

ground, and a good doublet cannot be used.

Short Antenna

I wish to erect a new antenna on 20-foot iron pipes above the roof of my two-story house. At the top I expect to use a short doublet, which cannot be stretched out because there is not sufficient length, and lower down there will be an "L" type aerial. Can these antennas be switched to the set at will?

It is unfortunate that frequently the good qualities of a doublet type of antenna cannot be utilized in full because lack of space prevents the full length of the wire from being stretched between the two supports. As soon as you cut down the length, which must be removed in equal sections from both extreme ends of the doublet wires, you change the whole balance of the system and prevent it from resonating on the frequencies to which it is tuned. Then, too, coils and transformers sometimes must be used to load the antenna and bring it back to its peak. All these things add additional and energy wasting parts in the circuits.

Place at least two insulators at the ends of the aerial wires, so as to keep the wire ends at least two feet from each iron pipe. You should have no trouble with the "L" antenna, and any good doublet with loading coils, such as RCA's World Wide type, will be satisfactory. However, we should like to call your attention to the new RCA antenna, called the "Magic Wave," which is not critical as to length, and in fact, may vary between 20 feet to 120 feet in distance between ends. This antenna is really an "L" type, but there is a new transmission line and special antenna and set-coupling transformers. We think you could use this type in the limited space available, erected at the top so as to be as high as possible, and without the lower "L" type aerial which

you mention as desiring. This system tunes uniformly between 530 and 23,000 kilocycles. If you address the RCA Manufacturing Co., at Camden, N. J., and mention RADEX, they will mail you data on this new system so you may decide whether it is suitable to your conditions.

Using Two Antennas

I have a spider web antenna up now, pointing east and west, and it brings in north and south stations very nicely. I have a G. E. single V doublet also, and do you think I could put it up running north and south for east-west stations, and have both leadin lines attached to the receiver, which is a RCA Victor 15K? At one place these two antennas would be about 5 feet apart.

Since the two antennas, one pointing north and south, and the other east and west, should cover the four points of the compass broadside to the line of the antennas, it is practicable to use them both with one set. To do this we suggest that you procure a porcelain base 110-volt double-pole double-throw knife switch. This has six connections. The two contacts in the center, which attach to the two blades, should be connected to the two terminals of the receiver with a very short length of twisted wire—not more than a few inches. The twisted leadin or transmission line from one antenna should connect to the pair of contacts at one side of the switch, and the other line to the two at the opposite end. Moving or throwing the switch from one side to the other will connect either aerial to the set in an instant. If you use a set transformer for matching the impedance of the transmission line, it should be connected between the switch knives and the set. If you use two transformers, each should be connected at the switch terminals for the two leadins.

Local Noises

I am a patient in a sanatorium, equipped with every modern electrical device, and I naturally pick up these noises on my bedside Crosley 5-tube all-wave set. What about a noise eliminator? Are they expensive? Also what antenna will help me? The building is equipped with a central receiving set and headphones for every patient. Is it possible that this system causes interference?

It is more than likely that you are picking up many noises through the power lines of the hospital. Where so many electrical devices are constantly used, switches are clicked on and off almost incessantly, cleaners and elevators always run, and not least, but most troublesome, are the radio therapy machines and x-rays. Noise entering the receiver by way of the electric power line usually can be suppressed by the insertion of a filter device between the outlet plug and the set. If the filter has a ground terminal, *do not* connect it to the ground terminal of the set, but connect it to the conduit of the wiring system or the metal plate around the wall socket outlet. Do not use a filter that is too small, but procure one that has a combination of condensers and coils, for capacity and inductance is what is needed to do a proper job of filtering. A good one should cost approximately five dollars.

In addition to the noise that comes to your set by way of the power lines there is a certain amount that is picked up by the aerial and leadin wire. We do not know whether this is your case, for you may be using a very good noise-eliminating aerial. Any reliable antenna, if equipped with a proper kind of twisted transmission line of the correct length and a set transformer to match the input impedance of the receiver, should cut

down noise pick-up between the antenna top and the set. However, what takes place up at the antenna is something no one can control. The only thing to see is that the horizontal wires are placed as far away as practicable from elevator housings, power wires and other sources of interference, as well as nearby antennas. In any case the doublet antenna must be erected *parallel* to nearby electric wires.

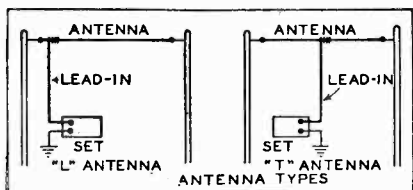
We doubt whether much interference is brought to you through the hospital system of radio reception. Of course, local noises may be picked up by the headphone wiring system and conducted to your set if it or its antenna wires pass very close to the headphone wires.

Grounded Aerial

What length should a grounded antenna be if it has a flat top inverted "L" and uses 38 feet of light insulated telephone wire for leadin? I wish it to work on the three wave bands indicated—3.7, 7.2, 7.2 to 14.0, and 14.0 to 22.5 megacycles.

We might speak of the grounded type of antenna as the old type, since it was in fashion long before doublets and noise-reducing antennas were known. In the grounded antenna system the two terminals of the radio set are connected to the overhead antenna wire and to the ground. There are three important features to consider—the length, height and ground system. This type should be as high as practicable with a good ground contact. The ground may be made to a cold-water pipe where it enters the basement of the house. The ground lead should be as short as possible.

The antenna top usually is "L" or "T" shaped, with a single down lead wire. In the former type of antenna the leadin in particular adds to the effective length of the wire available for picking up signals. If a double leadin is used, then we get into noise-eliminating an-



tennas; the doublet type corresponds to the "T", and the so-called Zeppelin or "Zepp" type being similar to the "L" antenna. The antenna length should be approximately one half a wave length for the lowest frequency to be used in each wave band. Some experimenters believe that the length should be cut to one half a wave length for the average coverage of the band used. Thus, in your set, an average antenna on the 3.7 to the 7.2 megacycles limit (5.5 mcs. or 55 meters), should be 27.5 meters or 92 feet, including leadin, if the antenna is of the inverted "L" type. Since you use a 38-foot leadin the actual length of the flat-top should be 54 feet. Point the flat-top portion away from the set, and the leadin connection directly toward the station most desired. If a "T" type aerial is used, with single leadin wire directly from the mid-section, the total length of antenna should be twice that of an "L" antenna, as you really have two "L's", back to back. If you have two leadins from this double "L" or "T" aerial, you will then have a doublet. In this way you can experiment with different aerials and determine the one which best covers the wave lengths desired.

Why A Doublet?

Please explain to me why a doublet antenna is so widely advised. What is wrong with the older types of single-wire aerials, or is it that they will not work on the short waves?

The doublet antenna, or any antenna system that utilizes two twist-

ed or transposed wires in its leadin or transmission line is primarily designed to reduce electrical interference or man-made static noises. Otherwise the doublet has little or no advantage over any properly erected single-wire antenna, such as the inverted "L", "T", fan or spider-web antenna.

If you live in a community where man-made static is bad, and where automobiles, power lines and street cars pass up and down nearby thoroughfares, then undoubtedly a good doublet or noise-reducing antenna system is of great value. Not all noise-reducing aerials are doublets, of course, for there is the famous Zeppelin arrangement and the new RCA "Magic Wave" antenna, as well as others.

Should you be so fortunate as to reside in a quiet region associated with little or no electrical interference in the home, then a simple single-wire antenna is about as good as any. It may be short or it may be long. However, it is the opinion of many radio engineers that the length of the antenna should be one half wave. The total length of a "T" antenna should be twice that of the inverted "L", for the completed aerial is really two "L" antennas, back to back, with a common lead. Therefore, the "L" type should be one-half wave length long, and the "T" type should be a full wave length in length.

Whether you use a doublet or single wire antenna, depending upon local interference, you will be confronted with the problem of how long to make the wire. Naturally, in an all-wave set, say with three bands, you must arrive at some compromise since it is not always practicable to utilize three separate antennas, one for each wave band. In practice it is advisable to select the shortest wave length to which the receiver tunes, and make the an-

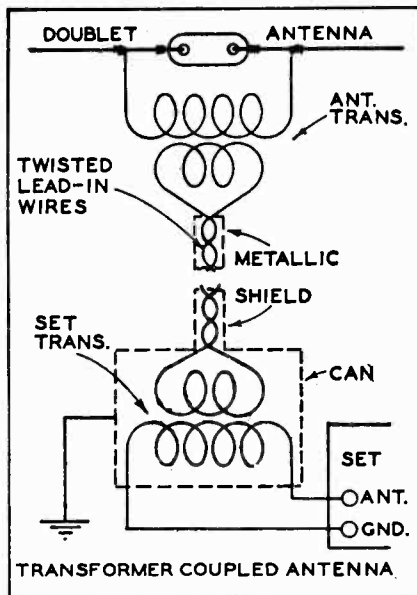
tenna just half of that length if it is a doublet or "L", with one or two leadin lines, and the full length if it is a conventional "T" type. This will provide an antenna that will respond with greatest pickup on the shortest waves, which usually come the greatest distances and are hardest to find. The pickup on the longer waves and the broadcast band is not so critical, particularly the latter band, and the antenna otherwise will be fairly sensitive throughout the range of the set.

If you have excessive local noise by all means use the doublet or other noise-reducing systems, or a shielded leadin on the ordinary antenna (which on short waves is not always satisfactory); otherwise a good horizontal No. 14 bare copper wire, well insulated at the ends, erected as high as possible, will give excellent results.

Antenna Transformers

One of the problems that arises in the use of modern antenna systems and which I do not understand, is why it is necessary to use transformers between the leadin and the radio receiver. Please explain this to me. Is it possible for the experimenter to make his own antenna system and the transformers that go with it?

When a doublet antenna is erected, or any other type using twisted or transposed leadin wires, there are certain complications which arise to prevent maximum signal strength being carried into the radio receiver. A leadin of this type has a certain amount of capacity, since the two wires are adjacent, like the plates of a condenser. If a shielded leadin is used, the capacity is even greater. When the capacity is high the impedance of the line is small, but when the wires are loosely twisted, as in most transmission lines, the capacity is small and the impedance is high. It is the combined effect of inductance,



capacity and resistance that creates a condition called impedance. It is natural to all electrical circuits, and particularly so in radio-frequency circuits, such as the antenna and pre-selector circuits of the radio receiver. Impedance is almost another way of saying resistance to the flow of an alternating current, especially at the high or radio frequencies.

If the transmission line connecting the antenna to the set is long then we must consider its resistance or impedance. The aerial, too, has some impedance; also the antenna coil of the radio receiver. Now we must match the impedance of the leadin to that of the antenna, as well as to the receiver. If the impedances are not carefully matched or balanced, we cannot obtain a maximum transfer of energy from the antenna to the receiver. In order to match these impedances we must use two small r-f transformers, one between the antenna and

(Please turn to Page 56)

Night Life of the RADEXERS

• • • By Carleton Lord

AS DXers on the North American continent stand by to blow the lid off another new season, indications are that a banner winter lies ahead of every midnight marauder.

The Federal Communications Commission has been dishing out construction permits right and left, and more than a score of new stations will be operating as potential targets by the time the season is well under way. Many of these are already listed in the schedule of monthly frequency checks, while many others will soon be heard on early-morning test broadcasts.

Listeners who are interested primarily in foreign reception will not be disappointed. General reception conditions may not be as favorable as a few years back, but improvements in transmitting and receiving equipment should make up for losses in signal strength. For those who point to unsatisfactory records during the last season, we refer to the July 26th issue of the CDXR bulletin which gives the final results of their foreign broadcast band contest.

Grand prize winner was R. H. Tomlinson, Port Chester, N. Y., and here are the stations which he reported and verified: LR1, LR3, LR5, LRS, LS2, LS8, LS9, LU7, CX26, PRF3, PRE8, HJ4ABN and YV1RF in South America; 1YA, 3YA, 4YA, 4BK, and 2NR in the Antipodes; KHBC and KGU in the Hawaiian Islands; Post de L'Ile (Paris), Rennes-Bretagne, Radio-Lyon, Radio Paris P.T.T., Bordeaux-Lafayette, Radio Cote d'Azur, Poste Parisien, Marseille P.T.T., Grenoble, Fecamp and Toulouse in France; Frankfurt, Leipzig, Stuttgart, Gleiwitz, Dresden,



Bernardine Flynn, who portrays the role of Sade in "Vic and Sade," NBC dramatic story which depicts everyday happenings in the lives of a typical American family. Only three actors are heard, Miss Flynn as "Sade," Art Van Harvey as "Victor Gook," and young Billy Idelson as "Rush," their son.

Munich, Kaiserlautern, Konigsberg, Saarbrucken and Koln, Germany; plus EAJ15, I1TP, I1MI, I1FI, I1BO, HAE4, OKB, OKK, RV36, Hilversum, Sottens, Beromunster, HAL, London Regional, West Regional, Belfast, Burghead, Vienna-Bisamberg, Klaipeida, Brussels No. 1, Bucharest, Vlaanderen and Bregenz.

Contrary to first opinion, the latter stations do not compose a list of European broadcasters. They are merely the stations which Mr. Tomlinson verified during what was generally considered an off year, and it must be remembered that each verification was inspected and approved by the CDXR contest judges.

If one listener is able to make

such an outstanding record in the course of one season, what is to keep other DXers from showing a fine log of foreign stations during the coming winter?

Courtesy Programs Work

Much has been said in recent years about the work of the various Courtesy Programs Committees. For a time, it appeared that the race between clubs to schedule the greatest number of dedicatory programs would be disastrous. It was obvious that DXers were physically unable to report on all the broadcasts dedicated to their clubs, with the result that the stations, disappointed by poor response, would soon lose interest.

"To a great extent," comments Arthur E. Foerster, 1213 Bosart Ave., Indianapolis, Ind., Vice-president and CPCer of the NNRC, "I think the Courtesy Programs Committee is a thing of the past. Many DXers have suggested that the CPC's confine themselves to stations which are not on the schedule of frequency checks, or admittedly hard to get. That idea is all right, but try to put it into practice.

"Several times I have found that stations which broadcast for the FCC once a month and are not difficult to hear, frequently want to give a series of DX broadcasts. I tried to discourage this 'series' business last season, but several stations insisted on giving weekly and semi-monthly programs.

"Then, too, other broadcasters will plan a series for the NNRC without effort on the part of the club. They merely work out the details and then notify the club when arrangements have been made. If I have failed to contact these stations, the club officers will think that I have been lax in my CPC work. On the other hand, the only way I can find out which stations want to DX for the

club, is to write to all broadcasters on my frequencies.

Personally, I think that the frequency checks have killed CPC work in the United States and that the real field in the future is in foreign broadcasts. Bill Applegate did notable work for several years with the Canadian stations, and last year did a fine job with the Mexicans."

Local Organizations

A note from George Poulain, 67 Mt. Pleasant St., Sydney, N. S., sets forth an idea which could bring added pleasure to thousands of DXers in every part of the country: "How about some of the fans down here getting together and forming a DX club? Some of the boys get good catches, and I think it would be swell to organize and be able to talk things over."

Perhaps one of the most beneficial angles of DXing is a regular meeting of DXers in one locality. Program tips are exchanged, reception kinks discussed, verifications compared. These personal contacts are far more enjoyable than any amount of correspondence, and yet they occur too seldom in the life of the average listener.

While the formation of local groups of DX enthusiasts is by no means a new idea, previous attempts frequently were sidetracked by the ambitions of the founders. Usually such organizations were in existence only a short time before they got "national" ideas. Bulletins were made to appeal to a nation-wide group of readers, members were enrolled from distant states, and the "local" club ceased to exist.

An example of what can be done by a compact group of listeners is afforded by the Toledo Radio Club, which was founded a few years ago. Under the able direction of its president, S. Raymond Lewis, it has shown a steady growth and includes in its membership many well-known

DXers, amateurs and radio servicemen. Maintaining strictly local ambitions, the club has followed a policy of serving listeners in its own territory. A bulletin is issued which covers reception in and around Toledo. Regular meetings provide for the exchange of tips and an opportunity to hear addresses by leaders in the radio field. At the time of the Ohio and Mississippi floods early this year, the club rendered conspicuous service during the emergency. The TRC now has its own club house and is making plans for the installation of a powerful amateur transmitter.

Perhaps one of the reasons why the Newark News Radio Club has maintained its position during the past ten years may be traced to its local activities. Members in and around Newark have an opportunity to get together at the regular monthly meetings, while chapters in Baltimore, Brooklyn, Indianapolis and other cities give the personal contacts which mean so much. Members from Connecticut to California attended the summer convention at Lansdale, Pa., last July and friendships, started through the mail, were sealed in person.

And so it would seem that there is an almost unlimited field for the organization of local groups in cities throughout the country.

WJRD Now Verifying

A most welcome bit of news comes out of the South to the effect that a change in management at WJRD and WMFO means verifications from these two holdouts. One of the first to receive a confirmation from the former was Jim Walker, Romney, W. Va., who writes:

"On Friday, May 7th, I heard WJRD test and announce that they would verify all reports accompanied by a self-addressed envelope or card. I sent an envelope with my report and the verification was back within a week. In answer to my question—

"Won't you please verify this report?"—Mr. Doss, the owner, wrote: 'Sure will, Old Boy. And many thanks!' "

"Like the Radexer who so reported in the Midsummer issue, I have been able to obtain a verification from KDKA," postcards George C. Canapp, 222 S. Carey St., Baltimore, Md. "I would like to receive letters from readers who use a Philco 116X and will guarantee to answer them all."

"I use different methods when reporting for verifications," supplies Sgt. A. W. Drummond, Box 56, Fort Douglas, Utah. "When a program is good and lasts at least a half hour, I write a complete report on the stationery of my radio club. When the program is good for only 15 minutes, I send out one of my proof of reception cards for the station to sign and return to me. In other words, the better the program, the more pains I take with my report."

"I do not ask for verifications very often," informs A. J. McBurney, Portneuf Station, Que., "although I do keep a log of times, dates and frequencies. After all, I never log a station until I have heard distinct announcements, so I am sure myself and that's all that matters to me."

Station News

As Radexers begin to spin the dials over the early-morning frequencies, they will find many changes from the set-up which they last heard in the Spring. The list of new stations in the September issue was unusually long while the changes in power and frequency will cause a certain amount of confusion at first.

From Cuba comes word that two popular stations have exchanged frequencies. The 5-KW CMCY has moved from 1030 to 570 kcys and is now operating weekdays from 8:55 a.m. to midnight, EST, and on Sundays from 10 a.m. to 10 p.m. The

station is owned by Manuel D. Autran and the Westinghouse Electric Co. of Cuba, and its address is Avenida de los Presidentes 215, Vedado, Havana. CMCX has switched from 570 to 1030 keys and is now operating with 150 watts power from 9 a.m. to 11 p.m., EST. The address: Calle Maceo 7, Guanabacoa., Havana.

"I have just received a verification from CMGF, Matanzas, Cuba," announced Kenneth Axelson, 5801 Dorchester Ave., Chicago, Ill. "The card shows their frequency to be 977 keys and their power 100 watts, although you have previously listed them on 1120 keys with 150 watts. You also listed them as verifying for ten cents in coin, but they sent me my confirmation in return for an International Reply Coupon. The proprietor of the station is Bernabe R. de la Torre, and the address is Gral. Betancourt 51, Matanzas, Cuba."

"There is a new local station down here," notifies Samuel A. Meyer, P. O. Box 754, Laredo Texas. "It is XEDF and operates on 810 keys with 75 watts power. They are on the air from 11 a.m. to 3:15 p.m. and from 7 to 8:15 p.m., EST. The own-



Three of radio's outstanding clowns are demonstrating here that they can sing as well as caper. Reading from left to right we have Judge Hugo Straight, played by Tommy Mack, Milton Berle in the center, and on the right, Bert Gordon, better known as Mischa Moody.

er is Sr. Ruperto Villarreal and the engineer is Sr. Florencio Loyo. The other two locals, XEFE and XEBK, are still on the air. XEFE now uses 980 keys with 150 watts power, while XEBK pushes its 50 watts out on the 1000 keys channel."

"Our local CKCK has been granted permission to boost its power to 1000 watts on their present channel," reports Paul Sampson, 1820 College Ave., Regina, Sask. "Although licensed for 500 watts, their old transmitter had an output of only 200 watts and it is expected that the new equipment will be a great improvement for listeners in this territory. The new transmitter will be located a short distance from the city and should be in operation by Fall. Engineers expect that it will eliminate a lot of their short wave harmonics and repeat points, especially near WSM."

"In the near future WMBG will make some extensive changes," advises George Hurd, 509 Spalding St., Elmira, N. Y. "They are going to switch from 1210 to 1350 keys and boost their power from 100 to 500 watts. Also, they will change from CBS to NBC. According to a letter of verification, the new equipment will include the latest RCA transmitter, the ground will have 6 $\frac{3}{4}$ miles of copper wire buried in five acres of earth, while the antenna will stretch 91 feet between two masts 216 feet high."

"Our new local station WSAU operates on 1370 keys with 100 watts power," supplies R. E. Dahm, 625 Nina Ave., Wausau, Wis. "They are on the air from 6 a.m. to 7:15 p.m., CST, daily except Sunday, when they sign on at 8 a.m. Also, from 4:30 to 5 a.m. they broadcast test programs of recorded music. Their RCA high fidelity transmitter feeds a 178-foot vertical antenna, which has been erected on top of their building. Their chief engineer is

anxious for reports and promises to verify all which are correct."

Personal History

"It was a little over nine years ago that I first got interested in DXing," observes Frank Wheeler, 406 Eagle Point, Lakeside, Erie, Pa., "although I didn't know it by that name. My Dad had received a 6-tube Silvertone radio on his birthday in May 1928, and I began logging stations. I heard of other listeners hearing stations like KFI, but I couldn't catch them. During the next year and a half, I logged 148 stations with KOA the most distant.

"One day late in 1929, my cousin showed me the December RADEX of that year. On my way home I bought the same issue and really started DXing. On December 29th, I heard KFI for the first time and KNX, which I mistook for KMJ. Being a green DXer, I wrote to KMJ for a verie and reported the catch to RADEX. In the next issue, Ollie Ross came back and reprimanded me for saying I had received KMJ, when he lived only a hundred miles from them and couldn't hear them. He was right. I had heard KNX and not KMJ. That taught me a lesson, and I won't make that mistake again.

"My next thrill of DXing occurred on March 7, 1931, when I heard VAS. But little did I know that this was only a start. On January 23, 1932, I got what I had thought an impossibility for my 6-tube set—XEW, my first station out of the United States. After receiving 375 stations on this set, I purchased a 9-tube Silvertone in September of that year. On October 2nd, I was greatly surprised to hear YV1BC. They sent me a very nice confirmation and I still claim that it is my best broadcast band verie.

"While I had had many thrills from my DXing, I was still not entirely satisfied. I had read of many

listeners hearing stations across the Atlantic and Pacific, but no matter how hard I tried I never was able to hear one. It wasn't until February 18, 1935 that I heard a faint carrier on 650 keys. Was this 1YA? The next morning I tuned to that frequency and heard the station coming through about R4. I heard a definite announcement and was so thrilled that I pulled the other members of the family out of bed to hear it. My other thrills that year included reception of TGW, LR5, CX26, HHK and many others.

"With the BCB log showing 657 stations last October, I went out and bought another Silvertone—this one being a 12-tube all wave job. At this time, I had two goals for my DXing—to hear my first TA, and to verify KWYO so that I would have a verie from every state and province. Last January 3rd, I heard Radio Normandie and two weeks later I logged Paris P.T.T. On March 13th, I finally landed KWYO.

"And so looking back on seven years of real DXing, I find that I have logged 796 broadcast band stations, of which 169 are verified. Of the better catches, I include 1YA, TGW, Radio Normandie, Paris P.T.T., HIX, WKAQ, WNEL, HJN, YV1BC, CX26, LR5, LR1, HHK, and KGU.

"My present Silvertone may be used with either of two aerials. One is 145 feet long, 45 feet high, and runs North-South with the lead at the South end. The other is by far the better of the two. It consists of 185 feet of solid enameled copper wire and is 65 feet high."

Getting Into DXing

"When I first began DXing," recalls Thomas W. O'Neil, 300 S. Main St., Jersey Shore, Pa., I was using a 1931 Stewart-Warner receiver. After reading the reports in RADEX, I decided that if so-and-so could

get Australia on a four-tuber, I would buy a big machine and go in for some real DX. After much deliberation, I bought a 1937 Philco 116X and set out to startle the DX world.

"You can probably sympathize with me. I soon found that I had to learn to use a radio. I had to learn patience above all else. Today I have come to appreciate every new station I hear, to love every night that is good for reception and, most important of all, to honor every effort made to provide listeners with information on how to get a new catch. So upon my graduation to the 'veteran' class, I find DXing practically perfect. I have a swell receiver, I have a swell magazine (RADEX), and I have a swell time—but I *have not* a single station in Delaware."

We hear of the many great things that radio has done for humanity.



Irma Glen, NBC's well-known organist, organized her own girl's orchestra and took it to Buenos Aires when she was only sixteen. Since then she has been in vaudeville, a concert artiste, and a theater organist. She has been heard in well over 10,000 broadcasts.

We hear of help summoned to a sinking ship at sea or a grounded flier far from the beaten path. We know of the vast communications systems which connect the far corners of the earth. We know of countless other services rendered by radio, but one of the greatest is that which is given to isolated groups in remote sections of our own country.

"We lumberjacks get a lot out of radio," writes T. J. Sanders, Box 32, Bly, Ore. "During the long, cold winter the deep snow makes it impossible to go anywhere, but the many fine programs we hear on our radios keep us from getting lonesome."

Speaking of Receivers

"Purchasing a new receiver offers many difficulties," asserts Wesley Shoemaker, RFD 3, Hillsboro, Ohio. "To satisfy most listeners, a set must have appearance, tone, power and selectivity. Most modern receivers have these requirements, although they are perfected to a finer degree in some models. The receiver which I selected for my trip around the radio world is a 1937 Zenith 5-tube, 2-volt battery model. It has a beautiful six-inch airplane dial, calibrated in three wave bands, and the tone is very good.

"After tone and appearance, the listener looks for power, and my new set has shown its ability to pick up weak signals and present them loud and clear. Also it has a fine degree of selectivity, as evidenced by the fact that I have been able to separate KNX from high power stations on each side as early as 8:16 p.m. I have never been sorry that I purchased this Zenith."

"Much has been said about the Canadian stations being content to get along on low power," offers Ernest Law, 10439 69th Ave., Edmon-

(Please turn to Page 49)

Tuning the

AMATEURS

● ● ● By B. L. Ahman, Jr.

SEVERAL dozen readers of this column have sent us their SWL cards and have indicated that they desire to exchange cards with readers. A complete list of their names and addresses is given elsewhere in this issue of RADEX under the heading "SWL Trading Post."

A new Peak Pre-selector has been added to our Zenith 12-tube set, and reception, while not exceptionally brilliant, is increased 100% every time the pre-selector is turned on. The Australians and Europeans are fairly consistent, with the South and Central Americans running rampant as usual.

Noticeable on the 20 meter band has been the large number of new Southern neighbor stations, and the fact that most of them seem to be members of the Rueda del Oeste, the International ham and SWL organization mentioned several times before in this column. Members of this club are compelled to QSL, and failure to do so means suspension from the club. Recent cards from Rueda del Oeste amateurs include OA4C, CE3DW, CO2JM and YV5AZ.

A stab at the 40 meter band resulted in a bad earache, no other results being obtained because of the excessive static usually prevalent on this band:

On 10 meters Carroll Weyrich reports K6's in the afternoon, but K6's and W6's are about all that he can hear now. When this band is "open," however, the entire world can be logged easily.

Our most consistent west coast correspondent, Hadley Wilcox of Los Angeles, says that June is the best month he has had on 20 meters, but

generally that band has not been satisfactory for him. K4SA was heard R8, VK2AZ R7-8, VK2ABD R8 and K7FBE, R7-8. He reports hearing both sides of a two-way between VK2ABD (Australia) and TI2RC (Costa Rica).

Another west coast reporter, Don Martinez of San Francisco, sends lots of dope on stations he is hearing. He reports that the Japanese can be heard in the PST Time Zone from 12 to 1 am and from 5 to 7 am. J2MI on 14075 is the most consistent while J2KJ on 14260, J2LU on 14035 and J6DP on 14230 are also heard. Don also reports three Malaysians at the same time, VS1AI on 14040, VS2AK on 14255 and VS3AE on 14240 kcs. The Javanese amateurs are very reliable between 3 and 6 am when the band opens up with PK6AJ on 14100. Others heard consistently are: 14010, PK3LC; 14020, PK3GD; 14040, PK1MO; 14050, PK1RR; 14080, PK6CI; 14090, PK1MX; 14090, PK1VM; 14146, PK4WS; 14260, PK1GL; 14265, PK2VD; 14280, PK1ZZ; 14310, PK3ST; 14374, PK1RI; 14374, PK4VR.

Don's list of Europeans causes us to hang our heads in shame, as he has most of us easterners beaten. British amateurs, he says, are always good. Continental stations come in between 7 and 10 pm, with ON4VK on 14076, CT1AY, HA3I and PAOWV leading the pack.

The antenna used by Mr. Martinez is a 60 foot single wire directed northeast and southwest. His receiver is a 6 tube Zenith. The balance of the stations shown in his report are given in our "Calls Heard" section. He gives the best time to tune for some of the continents as follows: South Africa between 5 and 7 am. Australians from 9:30 pm until the band closes down. Northern Africa near 8 pm. The Philippine Islands, always with R9

signals, in the early mornings. Two New Zealand amateurs are heard on 75 meters, ZL2BE and ZL2DO.

Readers are reminded that stations with the GM— call are the same stations listed with only G— calls in the old call books. Thus G6RG is now GM6RG. The GM— prefix was given to Scotland several months ago. GI— is assigned to Northern Ireland and GW— to Wales.

One of the most interesting stations in the 20 meter amateur band is W10XDA, on the Schooner "Effie Morrissey," which is now cruising in the vicinity of Greenland and in the Arctic Circle. W10XDA works frequently with American amateurs, and maintains regular schedules with W2OJ, which is owned by the Morrissey's operator, Clifton F. Foss, and operated by his wife during his absence. Reports should be sent in care of Mrs. Foss, W2OJ, 8214 Eleventh Ave., Brooklyn, N. Y.

YI2AB, Iraq, 14150 kcs, was logged by Frank W. Hoxie, So. Orrington, Maine, at 9 pm EST at R8. The address of this good catch is Messrs. Mellon & Norman, c/o Port Directorate, Basyra ya, Mirgil ya, Iraq.

Following are two Irish 'phones that will probably be heard this season. One is EI8G, Frank B. Whyte, East Bourne, Glenageary, County Dublin, and the other EI2J, N. Maddock, "Sherbro," Dartry Road, Dublin, S2, Irish Free State.

So far we have not been able to log an amateur in Paraguay. Have any of our readers heard Paraguayan 'phones? We would appreciate any tips so we can completely log the South American Continent.

Readers who have EA4BM cards should prize them highly, because it has been reported that the operator is a casualty of the Spanish War.

Julius Orosz' Log

"I began to log the 20 meter amateur stations in January of 1937,

and since that time have tuned this band exclusively," relates Julius Orosz, 12205 Parkhill Ave., Cleveland, Ohio. "Using a Philco 65OX, I have logged over 56 countries in this band alone. I used to keep a log by entering the stations in the order in which they were heard, but when I started to tune for amateurs only I decided to use a different system as the old method made it difficult to check back to see if I had already heard a certain station.

"My log is now kept in a Lefax loose-leaf notebook which takes 3¼ by 6¼ pages. Whenever a new country is heard a new sheet is inserted with the name of the country written on the top of the page and the stations heard listed underneath.

"I make it a practice to log only 20 meter 'phones heard outside of the USA and Canada. In order not to lose these two countries from the log, however, I keep track of the districts or prefixes heard, which so far are VE1— through VE5—, and VE9— in Canada, and W1— through W10— in the USA.

"As a means of comparing logs, I have devised the following system, which is very similar to that which was used to compute scores during the ARRL DX Amateur Contest. I simply multiply the stations heard by the number of countries heard.

"For example, ten stations from two countries would give a score of 20 points, whereas ten stations from ten countries would score 100 points. Using this system, my score is 322 stations times 56 countries, which amounts to 18,032 points. I believe it would be interesting to see some of the scores compiled by other DXers . . . some of them may have a score as high as forty or fifty thousand points."

Many thanks are extended to the readers who have written in. We are anxious to have more reports,

however, so we can compile a table showing the composite results of listeners in every state. We believe a log of this type will serve as a valuable guide to what kind of reception can be expected in any locality.

QRA's

The addresses of amateur stations mentioned in this column are given below:

CE3DW, Edmundo Guevara, Los Alerces 2741, Santiago, Chile.

CO2JM, Justo Mahia, Condesa 41, Havana, Cuba.

CT1AY, Manuel Dias Oliveira, Moreira da Maia, Pedras Rubias, Portugal.

K4SA, Richard Bartholomew, Barrio de Sabana Hoyos, Garrochales, P. R.

ON4VK, M. Koninecx, 47 Rue Juste-Lipse, Brussels, Belgium.

OQ5AA, Dr. G. Westcott, Tondo, via Irebu, Belgian Congo.

PAOWV, W. Vuyk, Eindhoven, Netherlands.

PK1VM, E. Th. Vermast, Riowstraat 77, Bandoeng, N. E. I.

PK2VD, A. C. W. Van Beutekom, Jogjakarta, Java, N. E. I.

PK3ST, J. H. A. Steenmekjer, S. F. Meritjan, Kediri, Java, N. E. I.

PK4VR, H. H. Vrouwes, N. P. M., Pladjoe, N. E. I.

PK6CI, E. R. Illing, Ambon, N.E.I. TI2RC, Roberto Castro, Box 1065, San Jose, Costa Rica.

VK2ABD, C. C. Galbraith, 43 Bul-kara Road, Bellevue Hill, NSW, Australia.

VK2AZ, H. L. Day, 2 Robinson St., Kogarah, N.S.W., Australia.

VS3AE, His Highness Tunku Ahmad, State Commissioner of Muar Johore, Johore, Malaya.

YV5AZ, Ernesto Eduardo Diaz, Este 4 No. 129, Caracas, Venezuela.

Amateur CALLS HEARD

The names and addresses of persons reporting stations shown in this list are indicated by small letters following the call signs. Key to the small letters is given at the end of the column.

C

CE: 1AH (*e*); 1AO (*ef*); 1AR (*e*); 3DW (*e*). CN8AJ (*c*).

CO: 2HY (*def*); 2KL (*f*); 2MQ (*f*); 2OG (*f*); 2OK (*def*); 2RA (*f*); 2RH (*ef*); 2RS (*f*); 7AS (*ef*); 7CX (*ef*); 8EC (*e*); 8VZ (*e*); CT1AY (*ce*); CT1CV (*e*); CT1GU (*f*); CX1CC (*e*); CX2AK (*e*); CX2AL (*f*).

E

EA: 2BH (*e*); 3DQ (*e*); 8AE (*e*); 9AH (*acde*).

EI: 2J (*ef*); 2L (*e*); 3J (*e*).

F

FA3JY (*c*); F3HL (*f*); F3HM (*f*) F8DR (*f*); F8QD (*f*); F8WK (*e*).

G

G: 2AI (*f*); 2AK (*f*); 2AV (*f*); 2PU (*efd*); G5BM (*f*); 5JO (*ef*); 5LS (*f*); 5LU (*ef*); 5SS (*f*); 5TP (*f*); 5TZ (*f*); 6JF (*ef*); 6VX (*ef*); 6XN (*e*); 6XR (*e*); 8AN (*e*); 8IK (*e*); 8SB (*e*); GI5QX (*e*); GM5NW (*e*); GM6RG (*ef*); GM6WD (*e*) GW5KJ (*f*).

H

HA3I (*c*); HC1FG (*e*); HC1RF (*e*); HC2CG (*e*); HB9A (*e*); HH2B (*e*); HH5PA (*ef*); HP1A (*e*); HR2A (*e*); HS1BJ (*c*).

J

J2KJ (*c*); J2LU (*c*); J2MI (*cf*); J6DP (*c*).

K

KA: 1AP (*c*); 1HS (*c*); 1ME (*cdf*); 1HS (*f*); 1MM (*c*); 1RB (*c*); 1YL (*c*).

K: 4SA (*eg*); 6BAZ (*def*); 6BNO (*f*); 6KMB (*f*); 6MVV (*df*); 6NTV (*ef*); 6NZQ (*d*); 6OLX (*d*); 7FBE (*g*); 7FST (*f*).

L

LU: 1QA (*ef*); 4BH (*def*); 4BL (*f*); 4KA (*f*); 5CZ (*de*); 6KE (*ef*); 7AZ (*e*); 8AB (*f*); NY2AE (*e*).

O

OA: 4AB (*ef*); 4AG (*e*); 4AI (*ef*); 4AK (*e*); 4AL (*e*); 4C (*def*); 4N (*de*); OE1CM (*e*); OE6PK (*f*).

ON: 4BG (*e*); 4MD (*f*); 4JAK (*e*); 4VK (*ce*); 4ZA (*e*); OQ5AA (*ce*).

P

PAO: EO (*f*); FB (*e*); FP (*e*); 1DW (*e*); MQ (*e*); UN (*f*); WN (*e*); WV (*ce*).

PK: 1GL (*c*); 1MO (*c*); 1MX (*ce*); 1RI (*c*); 1RR (*c*); 1VM (*cf*); 1ZZ (*c*); 2VD (*cf*); 3GD (*c*); 3LC (*c*); 3ST (*c*); 4VR (*c*); 4WS (*c*); 6AJ (*c*); 6CI (*c*).

PY: 1FR (*de*); 2BA (*ef*); 2FF (*e*); 3BX (*e*); SM5SV (*e*); SU1CH (*e*); SV1KE (*e*); TG1AX (*e*).

T

TI: 2FG (*ef*); 2LR (*de*); 2PG (*g*); 2RC (*eg*); 2RT (*e*).

V

VE: 1BD; 1FG; 1GK (*g*); 1GP; 2DQ; 2GH; 2ID; 2JJ; 3BU; 3FM; 3JU; 3KX; 3QJ; 3YW; 4AAY; 4GE; 4GQ; 4KZ; 4LX; 4PM; 4QV; 4TW; 4UG; 5HG; 5NP; 5NY; 5OT.

(VE1GK was heard by *g*; all others by *d*).

VK: 2ABD (*g*); 2ABG (*f*); 2AZ (*efg*); 2HF (*ef*); 2HP (*f*); 2HS (*f*); 2XU (*ef*); 2OQ (*f*); 3AZ (*d*); 3AG (*f*); 4JU (*ef*); 4KL (*f*); 4KO (*f*); 4VD (*ef*); 5AI (*e*); 6MW (*e*); 7CL (*e*).

VO: 2Z (*ef*); 6L (*ef*).

VP: 2BC (*e*); 2CD (*e*); 2DA (*e*); 3BG (*de*); 4TH (*f*); 5AF (*e*); 5AG (*f*); 5GM (*e*); 5PZ (*e*); 6FO (*e*); 6LN (*f*); 6TR (*e*); 6YB (*e*); 7AB (*e*); 7NA (*e*); 9G (*e*);

9R (*e*); VQ1AB (*e*); VS1AI (*c*); VS2AK (*c*); VS3AE (*c*); VS6AB (*c*); VU2LL (*c*).

X

XE: 1AG (*f*); 1AJ (*f*); 1AX (*f*); 1BC (*de*); 1I (*f*); 1Y (*d*); 2BJ (*f*); 2FY (*f*); 2HD (*f*); 2JK (*de*); 2XY (*f*); 3AR (*def*); 3W (*e*); XU8HW (*c*); XUSMT (*c*); XZ2EH (*c*); XZ2EZ (*c*); XZ2JB (*c*).

Y

YI2BA (*be*); YN1BJ (*e*); YN1HS (*e*); YN1PR (*e*).

YV: 3AD (*e*); 4AA (*e*); 5AA (*e*); 5ABE (*ef*); 5ABT (*ef*); 5AK (*ef*).

Z

ZE1JF (*c*); ZE1JR (*ce*); ZE1JY (*c*); ZL2BE (*c*); ZL2DO (*c*); ZS1AX (*c*); ZS1B (*c*); ZS2N (*c*); ZS2X (*c*); ZS5AB (*c*); ZS6AJ (*c*); ZS6AN (*c*); ZT2G (*c*); ZU6N (*c*); ZU6P (*ce*).

The Reporters

- (a). Carl and Anne Eder, Willmar, Minn.
- (b). Frank W. Hoxie, So. Orrington, Maine.
- (c). Don Martinez, 1469 26th Ave., San Francisco, Calif. (6-tube Zenith 6S-128).
- (d). Martin J. Olthoff, 212 N. 16th St., Independence, Kansas. (RME69).
- (e). Julius Orosz, 12205 Parkhill Ave., Cleveland, Ohio. (Philco 65OX).
- (f). Jack Siringer, 1451 Lincoln Ave., Lakewood, Ohio. (Truetone).
- (g). Hadley Wilcox, 623 N. 40th, Los Angeles, Calif.

HA8N, Budapest, Hungary, is being heard as loud as R8 as we go to press. Julius Orosz reports this good catch, stating it is audible most any time between 6 pm and 1 am, EST. The frequency is about 14145 kcs.



AFTER some thirteen years of logging stations in various parts of the world, I rather imagined that I knew the meaning of the term "verification." With nearly a thousand cards and letters in my files to show for the past five seasons and a hundred or so more from the middle twenties, I thought I could identify a verie when I saw one.

But after reading a letter which arrived the other day, I am beginning to wonder if I haven't been wrong all along. If my beliefs haven't been shaken to their very foundations, at least I have been mildly started. Perhaps the same sensation was experienced by the people who climbed a mountain one night to await the end of the world—and saw nothing but a glorious sunrise.

The letter in question was from a reader who was commenting on his attempts to scare up confirmations from a few delinquent stations. One of the broadcasters, he remarked, sent a card "which was not a verification, but merely said that my report compares completely with their log." "For myself," he continued, "I don't care whether they say the report is verified or not. Just so it is proof that I heard their station is all I want."

Until the receipt of this letter, I had always imagined that a verification was a statement by a station that a listener's report checked with

the station's log at a given time, and therefore was proof that the DXer had heard that particular transmitter. But if a letter saying that a report "compares completely" with a station's log is not a verification, what are all those cards and letters which I've been saving? And if a listener can obtain proof that he heard a station without having the station verify or otherwise confirm a report, it looks as though a lot of us have been wasting our time the past few years.

Once upon a time I got a card from Sweden which said: "You have probably received us, for the items which you mentioned were really broadcast on our program of February 14." The card was signed by A. Lindstrom for *Rundradiostationen Horby*, and I figured that I had a verie from SBH. But perhaps I was wrong.

Maybe I will have to disregard the card from 2CO, Corowa, Australia, which said in part: "The particulars submitted in your letter of the 14th December check up correctly with our log for that date." I have always thought this was a verification, but I may have been mistaken.

Why Verify?

Quite a few DXers today are questioning the necessity of obtaining veries from the stations which they log. A typical remark might go something like this: "I always make sure of a station's identity before I

enter it in my log, so there is really no need to write for confirmation. After all, I DX for my own pleasure and I don't need proof of what I know I have heard."

To a certain extent, it is possible to understand and appreciate this attitude. For many listeners, the chief thrill of DXing is the actual process of tuning, and happy are they whenever a new station is heard. If a collection of veries brings no added pleasure to the hobby, the DXer would be foolish to go to the trouble and expense of getting confirmations.

However, listeners who make a practice of verifying their catches will probably agree that they receive a very tangible return from this procedure. While it is true that a verie constitutes a rather definite proof of reception, it is seldom necessary to pull out a card or letter just to *prove* that a station has been heard. Still, it is probably more satisfactory to be able to say that Radio Normandie has been verified, than to report that the station had merely been heard on a certain date. Certainly it is an accomplishment to be able to show a distant broadcaster that you have heard his program, and it is nice to receive confirmation of this fact.

But it seems to me that verifications offer far more than just proof of reception of some station. To me, they are souvenirs of the long nights spent at the dials. They might even be compared to snapshots of vacation trips, since they bring back memories of thrilling catches and exciting reception.

I very definitely recall one May morning back in 1934. I had been listening to the frequency checks and was about to call it quits when the sun came up a little after five o'clock. For some reason or other, I stuck around until 5:20 when KRE at Berkeley, Calif., was scheduled to come on. Although it was broad

daylight when I tuned to 1370 keys, I was amazed to find the station coming through with a good R5 signal. I logged the full twenty minutes and wrote out the program by the light of the sun which streamed in the windows. I dashed off my report to the station that same day and, as a matter of record, sent a copy to the president of the NNRC, Irving Potts.

In a few days, back came the letter of verification from KRE "We thank you for your interest," wrote M. D. Hambly, "and congratulate you upon your success in receiving our signals under such difficult conditions. It might interest you to know that yours was the only report on this program which we have received from East of the Rockies."

Certainly a verification like that is worth a hundred notations in a log book that such-and-such stations were received.

Stunt Broadcasts

Early in 1933 the Warner Brothers released their musical picture "42nd Street" to the American movie houses. As ballyhoo for the film, they chartered a special train, named it the "42nd Street Special," loaded it with stars from the picture, and started a tour around the country. At each large city, the train would stop and the natives would have a chance to gawk at the celebrities. It was probably coincidental that the picture opened in each city shortly after the train had passed through.

Also aboard the train was a portable transmitter—KIED, which was operating on 1518 keys, with 250 watts power—owned by Warner Brothers' Hollywood Station KFWB.

On the night of February 26th, the "42nd Street Special" was heading for St. Louis and a gala opening the next day. As the train sped across the state, a program was sent out for pick-up and rebroadcast by

one of the St. Louis stations. At 1:32 a. m., EST, I ran across KIED and was able to log the entire program, including the early tests and the final check-up.

Now a verification of that broadcast would be a rare souvenir in any DXer's file, but a personal note from Ed Murphy of KFWB was a prize worth possessing.

Five days before hearing KIED, I ran across a couple of unusual catches shortly after 2 a. m. The first was EW7, the experimental station of the Michigan National Guard at Lansing, and this was heard testing on 750 keys. The other station was using 755 keys and announced its call as EQ7, but gave no location. After copying both tests, I wrote EW7 for a verie and asked for EQ7's address.

Within a week, back came the EW7 confirmation with a note from its operator, Corp. J. B. Osburn: "Thanks for QSL, OM. EQ7 is Regimental Headquarters station at Lansing. Write 119th Field Artillery Armory there. EW7 is the Second Battalion Headquarters station, which communicates with EQ7 every Tuesday morning at 2 a. m."

A report to EQ7 brought a prompt acknowledgment and verification from its operator, Corp. H. G. Crofts. While these two 50-watters were less than 200 miles distant and were probably heard by hundreds of DXers, I can't help but feel that these two veries are well worth having. Certainly they are more interesting than two lines in a log, noting that EW7 and EQ7 were heard on February 21, 1933.

Outlaw Veries

From an artistic standpoint, many stations have designed letter-heads which are truly distinctive. KGKO, KRGV, LR5, WAGF, WCAO, WJIM, WLW, WRWA and WMS use stationery which looks well in any collection, but to my mind RXKR

just about led the field in this respect.

Old timers will remember that this was the famous "cruising broadcaster" which caused so much comment back in 1933. With studios and transmitter aboard the SS City of Panama, regular daily programs were broadcast while the ship cruised outside Santa Monica Bay, Calif. My own reception of this 500 watt station on 815 keys, occurred on the morning of July 18th of that year, and I have always considered it one of my better catches. But even confirmation of such an unusual catch is made far more attractive by the handsome stationery and the courteous, friendly letter written by Cecil M. Newcorn, general manager.



Loretta Clemens, ingenue singer and comedienne on NBC shows, is a kin of the late Samuel Clemens (Mark Twain).

Usually unlicensed stations are not favorably inclined towards requests for verifications, but inside of a year I was fortunate enough to receive veries from three Ohio "outlaws." The first came from WAIR at New Philadelphia—and it is interesting to note that there is now

a licensed station of that call at Winston-Salem, N. C. The old WAIR was heard on July 30, 1932 and the letter of confirmation was post-marked six days later. Instead of a letterhead, Engineer Marion Weymouth typed the call and station address on a plain sheet of paper, but the verie was none the less welcome.

Station WJM at Massillon pushed its 7½ watts on 850 keys, into my receiver on February 18, 1933. Three days later the verification arrived, signed by E. C. Whitney, the assistant manager.

WDMC at Uhrichsville was the toughest of the three to verify. The station was heard April 26, 1933 on 800 keys. Two reports went unanswered, the third brought a query from the operator as to my "interest in his station," and the fourth finally resulted in a verie. Oddly enough, while operating this 7½ watt "outlaw," the owner of the station—Willard G. Demuth of the Demuth Music Store—had an application for a construction permit before the old FRC. It is probably unnecessary to record that the application was denied.

Tough Nuts

Most DXers are well aware that some stations require a lot of prodding before they will verify a report. I've come across a lot of tough ones, but I think KGFX at Pierre, S. D., was about tops. During the course of a year, I sent them ten reports and had about given up all hope. Then one day, back came no less than six of the return cards which had been enclosed with my letters.

KSEI, Pocatello, Idaho, at one time had a manager who hadn't much time for listeners who kept writing in and asking for veries. In fact, one understands that it was a more or less rigidly enforced rule that requests for confirmation should be

ignored. One day I heard that an amateur, then employed by the station, was inclined to sympathize with DXers and would, on occasions, undertake to answer DX mail on his own. A letter to him brought the desired verie, together with an admonition to keep the incident quiet "for fear the boss would find out."

WSAZ, Huntington, W. Va., was another tough nut to crack. Back in the Spring of 1933, five reports on as many programs went unanswered. Finally a note to the local Chamber of Commerce stirred the station into the belief that "civic pride should insure replies to all letters," and along came a string of five verification cards.

School Stations

Although only 70 miles away, WSAJ at Grove City, Pa., had long been on my list of "needed" stations. Its regular schedule called for programs between 7:15 and 8 p. m. on Tuesday and Thursday, and from 4:30 to 5:30 p. m. on Sundays. As it was but 10 keys, removed from a powerful local, it had been most elusive.

When the frequency checks began in the summer of 1933, WSAJ was included and I was able to hear them for the first time. But obtaining verification of that reception was quite another problem. Two reports were unanswered. In reply to a third letter, the operator wrote that the station had not been broadcasting at the time reported. Almost in desperation, I wrote the Commission in Washington, received a memorandum stating that WSAJ had been checked on the date and at the time I claimed to have heard them. A copy of this memo was forwarded to the president of Grove City College, which operated WSAJ. In a few days came a letter of apology and a most welcome verification.

A very similar case occurred after

The Shortwaves

I first heard WEHC, which was then operated by Emory and Henry College, Emory, Va. Originally logged on January 19, 1932, the station ignored five reports during the course of 13 months. Early in 1933, the station received permission to move to Charlottesville and went off the air. That appeared to close the case permanently and I was about resigned to include WEHC in the "heard but not verified" list.

As a final hope, I sent a letter to James N. Hillman, president of the college, and explained the matter to him. Although the equipment of the station had been dismantled and the staff disbanded, Mr. Hillman dug out the old records, checked my report with the old log, and sent me the desired verification.

Perhaps one of my most unusual veries came from KOB, which at one time was operated by the New Mexico State College of Agriculture and Mechanic Arts, at College Station, N. M. I heard KOB on April 1, 1932 during one of its late programs and wrote for a verie. A few months later, KOB moved to Albuquerque and I decided that I had lost my chance to get a confirmation.

On January 12th of the following year, I received the following note from Evan Carroon, General Manager of the old KOB: "In looking over some old records, I ran across a letter from you asking for a verification of KOB. I am very much afraid that we overlooked your request, so this will serve the double purpose of apologizing for our mistake and verifying your report."

Why I Verify

While dozens of other cases could be mentioned, these incidents may serve to illustrate the intrinsic value which I attach to my collection of cards and letters. Instead of cold notations in a log book, I have tang-

(Please turn to Page 50)

Argentina

LRU, Buenos Aires, 15290 kcs. announces their schedule as 8 to 10 am, but they were heard once from 9:08 until 11:15 pm. This station is known as "Radio El Mundo," Calle Maipu 555.

Australia

VK3ME Melbourne and VK6ME Perth are reported at R8, QSA4, and 3LR in Melbourne is received with an R6 signal. These stations will be receivable in the winter but not as reliably as in summer time. Their frequencies and schedules are given in our lists.

Verifications received by Carl and Anne Eder from VK6ME state that this station is now using 5 kilowatts power. They broadcast from 6 to 8 am, EST on 9590 kcs.

Canada

VE9HX Halifax was heard transmitting on 11705 kcs, announcing they were conducting experimental broadcasts. The frequency was announced. The address is Maritime Broadcasting Co., Box 998. Their regular frequency is 6130 kcs, which is used between 5 and 11 pm. EST.

CJRX Winnipeg made a surprise move in frequency, and is now on 11790 kcs. This was probably done to avoid interference from TPA4.

A station signing as VE9HS was heard by Anthony Tarr on 15190 kcs, and 11710 kcs. at 6:50 pm, EST. He believes it is aboard a Canadian vessel in the north. They were working with VE9AV in Ottawa. Information concerning this station is requested.

Chile

CB1109 is reported to be the call

in REVIEW

• • • Latest S. W. News

of the Chilean station on 12007 kcs, located in Santiago de Chile. The slogan of this station, heard from 7 to 9:30 pm, is "La Voz de Sur America." Our reporter, Mr. Tarr, is not positive of the call sign.

Colombia

HJ1ABP, reported on 9600, has been heard between 6:30 and 7 in the mornings, in addition to its regular schedule from 5 to 11 pm. They come on the air with the "Double Eagle" March. "Radio Cartagena," as the station is known, receives its mail at Aptdo. 57, Cartagena.

HJ1ABB, assigned 6115 kcs, is reported on 4770 by Carl and Anne Eder. They heard it at 8:20 pm, broadcasting a musical program. Reception was not very good, an R5 signal being reported.

Cuba

"La Voz del Radio Philco," COCX, is reported this month on 11490 kcs. with fair volume (R6). Their address is Box 32, Havana.

From the operators we learn that COCW, the new Cuban station, relays the programs of CMW Havana, from 7 am to midnight. COCW works on 6330 kcs and CMW on 600 kcs, both stations being owned by Troncoso y Gil, "La Voz de las Antillas," Paseo de Marti. The mail address is Apartado 130. Verification cards will be sent in response to all who report correctly on their transmissions.

Four other stations in Cuba are chronicled this month, COBZ, COBC, COGF and COCM. COBZ is reported as moving around between 9020 and 9100 kcs, but they are assigned 9030. Programs are broadcast

seven days a week until 11:30 pm. "Radio Salas" identifies the station, and the address is Apartado 866, Havana. "RCA Victor" and "Lotteria Nacional" are mentioned frequently on their programs.

COBC, assigned 9363 kcs, is reported on 9310, 9350 and 9360. This Havana station relays CMBC, "El Progreso Cubano," daily until midnight, EST. The postal address is Apartado 132.

COGF, Matanzas, is the best of the new Cubans. It works on 11800 and interferes with reception of OAX5A and the new Danish station. Programs of CMGF, "La Voz de las Provincias," are relayed.

The newest Cuban is COCM, 9775, relaying CMCM, a new BCB station on 850. The address is given over the air as Calle 23, No. 482, Vedado, Havana.

COJK, 8665 kcs, Camaguey, relays CMJK. Howard Phillips believes the owner is Frank Jones, Jr. He states that COJK replaces CO9JQ, which lost its license for relaying broadcast band programs on an experimental assignment. This rumor is not confirmed, however. COJK sends an exceptionally beautiful verification card.

CO9WX, Tuinicu, 15555 kcs, transmits experimental tests to determine skip distances. Frank C. Jones owns the station. Two kilowatts power is employed, and tests are heard near 9 pm.

Czechoslovakia

The Prague station OLR5A, 15230 kcs, announces their schedule as 9:30 to 11:30 am, but they were heard at 9:11 pm, R8, QSA5. Reports to Prague are to be sent to Praha XII, Fochova Tr. 16.

Denmark

John Tate of Petersburg, Va. heard the new Danish broadcaster on 11805 kcs, from 6:30 to 8:20 pm.

EST. The program opened with chimes, and an announcement in English. During the time they were on the air three directional aeri- als were used. From 6:30 to 7 pm. the transmission was directed to the United States; from 7 until 7:30 an omni-directional aerial was used, and from 7:30 to 8:20 the signals were directed away from this continent.

This station, which announces no call letters nor location, has been heard on Sundays as nearly as 3:30 pm, and in the evenings between the hours of 6:30 and 9 pm.

Dominican Republic

HIN, allotted 12500 kcs, is reported on 12.480 megs at 8 pm, EST. HIN, 750 watts, is situated in Trujillo, D. R. The address is Aptdo. 604.

El Salvador

YSE (possibly YSA) was heard testing on 11710 kcs, between the hours of 9 and 10 pm, by Anthony C. Tarr of Seattle, Wn. The call sign was announced frequently in English and the location was given as the City of San Salvador in the Republic of El Salvador. Reports were requested. This station was only about 20% intelligible because of severe interference from an automatic CW station.

Fiji

Amalgamated Wireless of Sydney, Australia, advise that station VPD2 Suva transmits on a frequency of 9536 kcs, 2000 watts power, Mondays through Saturdays from 5:30 to 7 am, EST. Our readers report them as receivable with about an R6 signal.

France

Pontoise, TPA2, 15243 kcs, appears to be at its best during the early part of its transmission. Best signals are noted near 6:30 to 7 am.

TPA4, 11720 kcs, now comes on the air at 1 am, EST. All the French (Pontoise) stations are known as

"Radio Coloniale," and are operated by the Ministere des Postes, Telegraphes et Telephones, 98 bis, Blvd. Haussmann, Paris.

Germany

The German stations continue to be about the best stations on the air. DJQ with R7 volume is the poorest, but this was recorded at 10 pm, which is not the best time of day for stations on 15280 kcs.

DJB has been conducting tests and DJL has carried the DJB programs during the test periods. Both these stations are heard at R9.

DZG, probably in Nauen, was logged from 5:45 until 6:15 pm, on 15360 kcs, relaying the regular German s. w. program. It is believed these commercial stations relay the s. w. programs while the regularly assigned broadcasting stations are undergoing tests.

DJR Berlin, 15340 kcs, puts only an R3 signal into the middle west during their late afternoon broadcasts.

Great Britain

Weak signals are reported in the middle west from the Daventry stations GSG and GSO. The poor reception no doubt is due to the fact that transmissions at the time reported are not directed towards this continent.

The best of the Daventry stations this month seems to be GSI on 15260, although GSD and GSF run it a very close second. Daventry, like Berlin, can be heard with at least a fair signal every day of the year. Complete schedules of these stations are given in our indices.

India

A station believed to be VWY, Kirkee, on 17548, was heard relaying a special program one day between 3:20 and 3:48 pm, EST.

Japan

JZJ is the best Japanese station at the time of writing. A good R8 sig-

nal is heard on its morning programs from 8 to 9 am. JZK 15160 kcs, and JVN 10660 kcs, are the only other Japanese reported, both of these at R6.

Manchukuo

A new Asiatic station to try for is JDY in Darien, Manchukuo, on 9925 kcs. The daily schedule runs from 7:15 to 8 am, EST. Programs at first included a half hour news broadcast in English concerning the Sino-Japanese War, but lately all speech has been in Japanese or Chinese. Oriental and Occidental recordings are played frequently.

Mexico

The Veracruz station XEFT, which relays BCB station XETF, has shifted frequency from 9492 to 9550 kcs.

XEW, Mexico City, D. F., relays XEW on 9500 kcs. It uses the slogan "La Voz de America Central" and sometimes "Radio Mexico." Heard in the East R8-9, QSA5 until 1 am, daily XEW is also heard frequently on 15190 kcs.

XBA, Tacubaya, D. F., was heard calling on 6915 at 10:10 and 11:10 pm, irregularly.

Netherland East Indies

The best Javanese stations in the East now are YDC 15150 kcs. and PLP 11000 kcs. They are both heard at fair speaker volume, PLP near 5 am and YDC between 6:30 and 8:30 am.

Panama

The new Panamanian HP5A, 11700 kcs, is heard in Seattle with a fair signal daily until 10 pm, and sometimes until 10:30 or later. Tony Tarr says he does not believe they have a fox trot recording that was made since 1920 . . . the most modern one played so far being "What's the Use?" Verifications from HP5A indicate that it is owned by the Star and Herald Theater, Apartado 954. A power of 500 watts is used. Their

slogan is "Radio Teatro Estrella de Panama."

HP5J on 9610, Panama City, broadcasts a program of the Panama Jockey Club from 9:45 to 10 pm, EST.

Paraguay

ZP14, "Radio Cultura," Villarrica, Paraguay, is operating experimentally from 11 am, to 5 pm, on 6312 with a power of one kilowatt. Their first broadcast was on July 3rd but a different frequency was used. It is believed 6312 is their assigned spot.

Peru

The City of Lima is heard through OAX5A on 11800 (when not interfered by Matanzas) between 9 and 9:30 pm, broadcasting Spanish and American recordings.

OAX1A, Chiclayo, formerly on 6150 and 6170, is now being heard on 6335 and 6350 kcs, signing off at 11 pm, EST. They are also reported on 6312 at 9 pm, transmitting test programs.

Philippine Islands

KZRM, the Philippine's first s. w. broadcast station, transmits daily from 5 to 10 am, EST. on 9570 kcs, and is heard a good R7 on the Pacific Coast. The slogan is "Radio Manila," and programs of KZRM on 618.5 kcs, are relayed.

Portugal

CSW in Lisbon is heard well on both its frequencies. On 9940 it is one of the best signals on the air at this time, reaching its peak near 7:45 to 8 pm. CSW is heard on 11040 kcs, between 7:15 and 8 pm. Announcements include the slogan "Emisora Nacional." The address is Rua do Quelhas. This station submits what we believe is one of the most attractive verification cards.

Spain

"Radio Nacional de Espana," located at Salamanca, broadcasts regularly between 4:30 and 6 pm, EST on 10823 kcs.

EAR is reported on 9490, R9, QSA5 in the evenings.

A station announcing as "La Voz del Partido Comunista Espanola desde la Capital de la Republica," is heard on 15135 between 6 and 6:45 pm, daily. It is located in Valencia.

Spanish Morocco

EA9AH, located in the 20 meter amateur band (14030 kcs.) is heard nearly every night at R7 volume. A lot of marches and speeches are heard, and the crowds cry "Viva General Franco" during the spell-binding sessions.

Switzerland

The Secretariat of the League of Nations transmits League programs on station HBP and HBL, 7797 and 9595 kcs, respectively, on Saturday afternoons from 5:30 to 6:30 pm. Mr. Michael Barkway requests that reports on these programs be addressed to him, Office of the Secretary-General, League of Nations, Geneva.

Programs arranged by the government of Switzerland for Swiss residents abroad are transmitted on Saturdays from 6:45 to 8 pm, EST on Station HBJ, 14535 kcs, and HBO, 11402 kcs. Reports on these broadcasts are to be sent to C. H. Calame, Radio-Suisse, S. A., 12 quai de la Poste, Geneva.

U. S. S. R.

Two of the Soviet stations have been heard very well in Canada and in the Great Lakes Region. They are RAN and RKI, 9595 and 15040 kcs, respectively, operating between 7 and 9:15 pm, EST. It has been reported that RKI is now using 15025 kcs.

United States

A station WYK, Montgomery, Ala. is noted on 11390 kcs.

The WCAU Broadcasting Co., Philadelphia, operators of W3XAU, have been given permission to add

frequency 21520 kcs. to the 6060 and 9590 kcs. assignments already in use.

A complete listing of the police broadcasters of North America was given in the September issue of this magazine. Changes which have occurred since then are given below.

New Stations

- 1626 kcs: KOSO Oklahoma City, Okla., six portable stations in Oklahoma, KOSP-R-U-W-X and Y. WPWV Charleston, W. Va.
- 1642 kcs: KASP Little Rock, Ark.
- 1666 kcs: WSPN Nantucket, Mass., WSPO., Oak Bluffs, Mass.
- 1698 kcs: WMSH Conoquingo, Md.
- 1712 kcs: KHAA Wahiawa, T. H., KHAB Kaneohe, T. H., KHAC Pearl City, T. H., WMPN Needham, Mass.
- 2414 kcs: KASE Modesto, Calif., WMPF Waycross, Ga.
- 2422 kcs: KAGD Woodland, Calif., KASG Willows, Calif.
- 2430 kcs: WPRH Rock Hill, S. C.
- 2442 kcs: KADG Eugene, Ore., WMPI Anderson, Ind.
- 2450 kcs: KADG Tulsa, Okla.
- 2458 kcs: KAPJ Sweetwater, Texas, WMPJ Clinton, Ill.
- 2474 kcs: WAMI Shelby, Ohio, WMPK Fremont, Ohio.
- 2490 kcs: KADF Yuma, Ariz., KASH Portable-Mobile in State of Wash., WMPL La Porte, Ind.
- 2726 kcs: WQPY, Portable-Mobile in Illinois.

WPHF Richmond, Va., 2450, has increased power to 400 watts and KNGR Spokane, Wash., 2490, now uses 250 watts.

WRDR Grosse Pointe, Mich., 2414, has a construction permit to increase power to 350 w. and to change frequency to 2466 kcs.

New stations have been granted construction permits in the cities of Montgomery, Ala., Waukesha, Wis. and Ponce, Puerto Rico.

Uruguay

Two Uruguayan stations are relaying the programs of LR3, "Radio Belgrano," according to reliable information received from Argentina. The stations are CXA8, 9505 kcs, and CXA14, 15170 kcs.

Ships

The M. V. "Kanimbla," VK9MI, has been starting their broadcasts at 7 am, lately, but they operate on irregular days. A ship's whistle and bells open the program and announcements are made by a lady.

SWL Trading Post

THE following desire to exchange SWL cards: Clement McColgan, 2905 Alphonse Place, Honolulu, Hawaii. Wm. Buchanan, 189 Park St., Sydney, N. S., Canada. Conrad G. Tilly, 95 Chesterfield Road, St. Andrews Park, Bristol 6, England. **California:** Kengo Takano, Box 203, Indio. **Colorado:** Ben Boucher, 952 S. Vine St., Denver. **Connecticut:** Emily Griswold, 326 N. Main St., West Hartford. **Illinois:** Arthur E. Judson, 1334 Clarence Ave., Berwyn. H. E. Rebensdorf, Harvard. Floyd M. Murphy, 615 W. Franklin St., Palestine. **Indiana:** Henry Blocker, 812 Brown St., Valparaiso. **Iowa:** H. C. Hendrickson, Jr., Route 1, McGregor. **Maine:** Elvyn L. Barker, 27 River-view, Portland. **Maryland:** Neville C. Seymour, 3720 Hillsdale Road, Baltimore. **Michigan:** C. M. Bolton, 11411 Evanston Ave., Detroit. Ellis J. Bird, 1404 N. Burdick St., Kalamazoo. **Missouri:** Mrs. Ida P. Rogers, Dearborn. **Nebraska:** Mildred E. Johnson, Wahoo. **New Jersey:** Andrew Nuzer, 603 Malone Place, Harrison. Alice Wilbur, 226 Mulberry St., Newark. **New York:** Frank H. Breneman, 115 Carlisle St., Rochester. **Ohio:** Raymond F. Sickler, 420 E. Baird Ave., Barberton. Fred Kiesel, 810 Roosevelt Ave., Bexley. Thomas H. McCormack, 3672 Lyle Road, Shaker Heights, Cleveland. C. E. Webb, 161 Blenkner St., Columbus. Jim Guthrie, Jr., 124 Cedar St., Elyria. Carl E. Crissey, 3390 Glenwood Ave., Toledo. Walter C. Ellia, 3821 Peru St., Toledo. Wm. H. Johnson, 3833 Burton Ave., Toledo. Jack Bebout, 135 E. North St., Wooster. W. F. Gallion, 5220 E. University St., Wooster. **Oklahoma:** Charles King, 1011 S. 5th St., Chickasha. The following all from Ponca City: Miss



Conrad Thibault's first trip to the west coast was for a guest appearance with Fred Astaire, but the listeners liked him so well he has remained as the singing star of the Packard Program.

Nonie Brown, 608 N. Fifth, and Roy Brown, Jr., same address. Virgil Farnam, 709 N. Pine St. Fred Finley, 529 N. Ninth St. Norman Glover, 305 S. Eighth. Austin Roquemore, 119 E. Hazel St. **Oregon:** E. C. Salting, Estacada. **Pennsylvania:** Clayton E. Clark, 164 N. Robinson St., and Harold Levinson, 1320 N. Marine St., both of Philadelphia. Albert Magagna, 550 Monument Ave., Wyoming. **Virginia:** Walton Knight, Belinda P. O., Accomac Co. **Washington:** Elmer R. Walker, Route 1, Alderwood Manor. Bill Glomstead, 7343 12th St. and A. C. Tarr, 909 W. Lee St., both of Seattle. Don. F. Adams, 224 E. Poplar St., Walla Walla. **Wisconsin:** Ollie A. Landgraf, 97 Park St., Chilton. Charles A. Spielman, Jr., 415½ S. Barstow, Eau Claire. Allan T. Smith, 1623 E. Marion St., Milwaukee. Armen A. Beer, 211 N. Division St., Waupaca.

New RADIO SHOWS for FALL

• • • By "Betty"

BEATRICE FAIRFAX: Bringing to radio listeners her experience gained through nearly forty years of correspondence with many thousands of those mystified and worried by life's problems, Beatrice Fairfax conducts her own program on Tuesdays, Wednesdays, Thursdays and Fridays at 1:45 to 2 pm, EST, over WOR and a list of seven-teen Mutual Network stations.

In general the shows follow a pattern which includes five different types of problem on each program.

"It was more or less by accident that my 'Advice to The Lovelorn' column was started back in 1898," says Miss Fairfax. "The late Arthur Brisbane, then editor of the New York Journal, stepped into my office

one afternoon and threw a couple of letters on my desk. He told me he didn't have the slightest idea as to how to answer them, and doubted if he could print them in the regular contributors' column to which they had been sent. In one, a young wife complained about another woman with whom her husband lunched daily. In the other, a girl revealed how she had been deserted by a young man at a time when he should have stood by.

"I answered them as well as I could. With that modest beginning my column got under way. Until Mr. Brisbane and I had it organized on a more systematic basis, we were almost swamped with letters because the idea of discussing life problems with a practically anonymous 'big sister' caught on quickly."

JEANNETTE MacDONALD: Miss MacDonald, soprano star of the stage and screen, has been assigned for a fall series of weekly programs to originate in Hollywood and to be broadcast over the WABC-Columbia network each Sunday from 6 to 6:30 pm EST, beginning October 3. She will be assisted by Josef Paster-nack's orchestra and a mixed chorus. Last year Miss MacDonald appeared with Nelson Eddy in a radio version of their successful picture, "Naughty Marietta." It was the great acclaim by her audience then that caused her to decide to appear in her own series featuring selections from operettas, and songs she has made famous in such screen successes as "Rose Marie," "May-time" and others.

Jeannette MacDonald is the third great artist to be presented in the Vick shows, which previously sponsored programs featuring Grace Moore and Nelson Eddy.

TIM AND IRENE: They've taken those city slickers, Tim Ryan, Irene Noblette, gag-writers Pearson and White, bugler Bunny Berigan, and



The author of the NBC dramatic serial "Girl Alone" is Fayette Krum, a writer who looks as good as her beautiful heroine. Betty Winkler takes the leading role in this series.

the rest of the MBS "Fun in Swingtime" company into the woods of Connecticut for their rehearsals. Hard by is the Tim and Irene summer cottage, filled with cool, long drinks.

"Why rehearse in a sweltering city?" asks Tim. "Give me vernal scenes and I'm funnier than all the Marx Brothers."

"It's marvelous," reiterated Larry White, "we write all the gags out in longhand. No one can read them; Tim has to ad lib and it's much funnier."

"When I blow my trumpet in the woods," chirped Berigan, "I feel like a boy scout. I'm learning how to make a fire without matches. I blow a hot tune over a steak and it's well done in a minute."

"Fun in Swingtime" is heard from coast-to-coast over Mutual every Sunday from 5:30 to 6 pm EST.

KATE SMITH: Radio's "Songbird of the South" has returned to the air as headliner of a new variety series over the CBS, heard Thursdays from 8 to 9 pm EST. For the past two years Kate has not been heard regularly on a complete nationwide network, but her new sponsor has engaged a coast-to-coast hookup embracing all parts of the country, including the Mountain and West Coast Zones for which there is a special repeat broadcast from 8:15 to 9:15 pm PST. As singing mistress-of-ceremonies, Kate conducts the same general type of fast-moving show in which she has scored outstandingly during the past two seasons. There are, however, a number of new entertainment features which she has not included in her hour heretofore.

ED McCONNELL: Smiling Ed McConnell, singing philosopher of the air, returns to the air as NBC's star and master-of-ceremonies of a new weekly show entitled "Sunday Afternoon with Smiling Ed McCon-



The Vass Sisters have been rising quickly in popularity. Sally and Virginia Vass are shown here with Kay Thompson, congratulating Daisy Eaton on a new diamond. Kay Thompson is seated, and her Rhythm Singers are, from left to right, Jean Norman, Sally Vass, Daisy Eaton and Virginia Vass.

nell." The program is heard at 4:30 pm EST over a coast-to-coast Blue Chain.

The Doring Sisters, the Grenadiers, the Campus Choir, the Rhythmaires and other outstanding choral units in the Midwest are heard in the show.

This marks the beginning of McConnell's 16th year as a radio artist.

FRANK CRUMIT: Stellar performers from the musical and entertainment world highlight the new series of 45-minute musical variety programs sponsored by the Coca-Cola Company over a 93-station hookup of the Columbia network, heard each week on Fridays from 9 to 9:45 pm EST.

The new show has Kitty Carlisle, the lyric soprano of stage and screen, as its star. Featured performers are Frank Crumit, the jo-

vial entertainer acting as master-of-ceremonies; Reed Kennedy, baritone, and Alice Cornett, rhythm singer.

Miss Carlisle has been starred in the long-running Broadway productions, "White Horse Inn" and "Champagne Sec," as well as the motion pictures "Murder at the Vanities," "She Loves Me Not," "Here is My Heart" and "A Night at the Opera."

TONY WONS: Tony Wons, popular radio personality who has been absent from the national networks for several years, will return to the air on a tri-weekly broadcast schedule, Monday, Wednesday and Friday at 10:30 am, EST, over the CBS Chain, beginning Monday, October 4. His home-spun philosophy and sympathetic drawling voice will again be heard reading from his well-known "Scrapbook."

HENNY YOUNGMAN: This youthful comedy "find" who made his radio debut on Kate Smith's program last season, has been signed by the Songbird of the South for her new full-hour series.

Youngman, discovered in a New York supper club last season, made several guest appearances on the "Bandwagon" series and proved so good he was retained permanently. His theatrical career started when he was nine years old, in a neighborhood talent show in Brooklyn. At first his efforts were directed entirely toward the serious drama, later he studied the violin, and then took up dancing. His appearances in these capacities resulted only in chuckles from a delighted audience, so he was forced to form a comedy dancing team with Kay Hoevel.

The Cleveland Radio Broadcasting Corp. applied to the FCC for permission to change the call letters of station WJAY to WCLE. The rea-



Walter O'Keefe, "Broadway Hillbilly," has been taking Fred Allen's place on the "Town Hall Tonight" program heard on the NBC-Red from 8 to 9 pm EST Wednesdays.

son for this request, it was stated, was that a new transmitter site is being used, new equipment has been installed and the studio location changed, as well as the management, making it an entirely new station. WJAY joined the Mutual System on Sept. 26.

Stations WFLA and WSUN have been granted a modification of their license to sever the one now issued to joint licensees in order to form two separate stations under the call letters WFLA and WSUN. They will operate specified hours as follows: WFLA, unlimited time on Monday, Wednesday and Friday, sharing with WSUN on Sundays. WSUN will work unlimited time on Tuesdays, Thursdays and Saturdays and share with WFLA on Sundays.

WFLA was also granted voluntary assignment of their license to the Florida West Coast Broadcasting Co., Inc.

The MONTH'S CHANGES in STATION DATA

NEW			NETWORK		
630	CMBC	Havana, Cuba	1010	KQW	San Jose, Calif., new MBS
680	WLAW	Lawrence, Mass.	1260	WNBX	Springfield, Vt., new MBS
810	XEDF	Nuevo Laredo, Tams.	1370	WEOA	Evansville, Ind., new CBS
850	CMCM	Havana, Cuba	1500	WNLC	New London, Conn., new MBS
1120	KTBC	Austin, Texas			
1200	WSAL	Salisbury, Md.			
	WTOL	Toledo, Ohio			
1210	CHLT	Sherbrooke, P. Q.	1310	WSJS	Winston-Salem, N. C. Piedmont Pub. Co.
1310	KARM	Fresno, Calif.			
	KRBA	Lufkin, Texas			
	WBRK	Pittsfield, Mass.			
1340	KDTH	Dubuque, Iowa	730	XEBC	Agua Caliente, B. Cfa.
1420	KFAM	St. Cloud, Minn.	850	CMCN	Havana, Cuba
	KTRI	Sioux City, Iowa	1080	XEAQ	Rosarito, B. Cfa.
1440	KELA	Centralia, Wash.			
FREQUENCY			CONSTRUCTION PERMIT TO CHANGE FREQUENCY		
570	CMCY	Havana, Cuba, from 1030	1190	WATR	Waterbury, Conn., to 1290
977	CMGF	Matanzas, Cuba, from 1120	1310	KIT	Yakima, Wash., to 1250
1030	CMCX	Havana, Cuba, from 570		WOL	Washington, D. C., to 1230
1120	WJBO	Baton Rouge, La., from 1420			
1350	WMBG	Richmond, Va., from 1210			
POWER			CONSTRUCTION PERMIT TO CHANGE POWER		
600	CFCF	Montreal, P. Q., 500 from 400	880	CMQ	Havana, Cuba, to 25000
780	WTAR	Norfolk, Va., 1000 from 500		WCOO	Meridian, Miss., to 1000
880	CMQ	Havana, Cuba, 2500 from 5000	900	KGBU	Ketchikan, Alaska, to 1000
1010	CKCK	Regina, Sask., 1000 from 500		WLBL	Stevens Pt., Wis., to 5000
1120	CKX	Brandon, Man., 1000 from 100	950	WRC	Washington, D. C., to 1000
	WJBO	Baton Rouge, La., 500 from 100	1190	WATR	Waterbury, Conn., to 250
1490	WKCY	Covington, Ky., 10000 from 5000	1200	WJRD	Tuscaloosa, Ala., to 250
			1310	KCRJ	Jerome, Ariz., to 250
				KIT	Yakima, Wash., to 250
				WOL	Washington, D. C., to 1000
			1340	WCOA	Pensacola, Fla., to 1000
			1440	WMBD	Peoria, Ill., to 1000
			1490	KFBK	Sacramento, Calif., to 10000
CALLS			CONSTRUCTION PERMIT TO CHANGE LOCATION		
880	WRNL	Richmond, Va., from WPHR	560	KSFO	San Francisco, to Oakland, Calif
1430	WMP5	Memphis, Tenn., from WNBR	570	KGKO	Wichita Falls to Ft. Worth, Texas
1450	WAGA	Atlanta, Ga., from WTFI	1500	KGFI	Corpus Christi to Brownsville, Tex.
LOCATIONS					
880	WRNL	Richmond, Va. from Petersburg			
1110	XELO	Tijuana, B. Cfa. from Piedras Negras, Coah.			

New Stamps

THE Constitution Stamp, commemorating the signing of the Constitution, went on sale at Philadelphia on Sept. 17.

The 3c Hawaiian Commemorative will bear a likeness of Kamehameha I, first of five kings of the Hawaiian Islands. The Virgin Island stamp of this same series will illustrate the harbor of the city of Charlotte Amalie, capital of the island. Designs for Puerto Rico and Alaska have not yet been approved.

Commemorating the Second Radio Conference of So. America, BRAZIL will issue two bi-colors, the 300 reis

orange and black and 700 r. blue and brown.

Few singers can boast of the help and encouragement of a former president of the United States, yet CONRAD THIBAUT, youthful baritone, can point to that distinction for it was Calvin Coolidge who first noticed his talent and offered him definite encouragement. Conrad was a choir boy at a Northampton, Mass., church where Mr. Coolidge often attended services. Thibault studied for five years under the guidance of Emilio de Gogorza, and on the completion of his studies was awarded a contract with the Philadelphia Grand Opera Co.

Progress in India

IN THE development of broadcasting in India it has been accepted by All-India Radio as a fundamental precept that a satisfactory broadcasting system must provide a measure of service to the whole country. The basic principle of broadcasting, therefore, is to provide a shortwave service to the whole country and to support this by a continual expansion of the area served by medium-wave stations as funds become available.

To this end ten transmitters have been ordered. Four shortwave "key" stations will be established at Delhi, Bombay, Calcutta and Madras, and will be of 10 kw aerial power. A second shortwave transmitter of 5 kw is also to be provided at Delhi for special purposes.

At the same time five medium-wave stations have been ordered, and will be situated at Lahore, Lucknow, Trichinopoly, Dacca and Madras, the first four of these being of 5 kw power and the fifth, 250 watts.

In India the shortwave service is essentially an internal service, whereas the European services are primarily intended for overseas listeners. It is expected that the Indian s.w. stations will normally operate in the daytime on the 30- and 49-meter bands, and at night principally on the new 60- and 90-meter bands for broadcasting which will be proposed at the forthcoming Cairo Conference.

The frequencies to be employed by the Indian medium-wave stations, with present frequencies, are listed below:

Trichinopoly will transmit on 758 kcs.

Delhi, now working on 882, will change to 886 kcs.

Lucknow will employ the 1022 kcs. frequency.

Lahore, now on 1200, will shift to 1086 kcs.

Dacca is expected to transmit on 1167 kcs.

Bombay will move to 1231 kcs. from 855.

Calcutta will change from 810 to 1276 kcs.

Madras will move to 1420 from 770.

Peshawar will continue to transmit on 1500 kcs.

Carroll Weyrich recently visited W3FAM at Arbutus, Md. and when the operator said that he had never contacted a Spanish amateur, Carroll dutifully took over the controls of 3FAM's set and tuned in EA9AH calling CQ. They then proceeded to have a half hour's QSO during which Mr. Weyrich talked to Tetuan in Spanish. Since 3FAM doesn't understand Spanish, we are still wondering what Carroll is bragging about. However, EA9AH did speak a few words in English. Which is a reminder that amateur listeners had better get busy and write to EA9AH if they haven't already done so. He sends a nice card which is worth having. This station is heard R9 most of the time and uses English as well as Spanish if necessary. Reply coupons or 5c in coin are equally acceptable to him, and his address is Tetuan, Spanish Morocco.

The Frequency Checks

In order to include many of the new stations which have recently come on the air, the engineers of the Federal Communications Commission have revised their list of monthly frequency check broadcasts. The latest schedule, with times given in Eastern Standard, follows:

The Second Monday

2:00-2:20	WLNH 1310	Laconia, N. H.
	WJBO 1420	Baton Rouge, La.
2:10-2:30	WBRB 1210	Red Bank, N. J.
	WHBB 1500	Selma, Ala.
2:20-2:40	WMAS 1420	Springfield, Mass.
	WIOD 1300	Miami, Fla.
2:30-2:50	WWRLL 1500	Woodside, N. Y.
	WJBW 1200	New Orleans, La.
2:40-3:00	WOKO 1430	Albany, N. Y.
	WMBR 1370	Jacksonville, Fla.
2:50-3:10	WCAX 1200	Burlington, Vt.
	WOPI 1500	Bristol, Tenn.
3:00-3:20	WMBO 1310	Auburn, N. Y.
	WMSD 1420	Sheffield, Ala.
3:10-3:30	WOC 1370	Davenport, Ia.
	WCAD 1220	Canton, N. Y.
	WMFN 1210	Grenada, Miss.
3:20-3:40	KWLC 1270	Decorah, Ia.
	WMBG 1500	Brooklyn, N. Y.
	WNBR 1430	Memphis, Tenn.
3:30-3:50	KFPW 1210	Fort Smith, Ark.
	WMEF 1310	Plattsburg, N. Y.
	WDBO 580	Orlando, Fla.
3:40-4:00	KABC 1420	San Antonio, Tex.
	WQDM 1390	St. Albans, Vt.
	WSMB 1320	New Orleans, La.
3:50-4:10	WFAS 1210	White Plains, N. Y.
	WHEP 1500	Koschusko, Miss.
4:00-4:20	KFDM 560	Beaumont, Tex.
	KLS 1280	Oakland, Calif.
	WCAP 1280	Asbury Park, N. J.
	WAGF 1370	Dotliam, Ala.
4:10-4:30	KORJ 1310	Jerome, Ariz.
	KMLB 1200	Monroe, La.
	KYOS 1040	Merced, Calif.
4:20-4:40	KLUF 1370	Galveston, Tex.
	KGDM 1100	Stockton, Calif.
	WDEV 550	Waterbury, Vt.
	WDNC 1500	Durham, N. C.
4:30-4:50	KROC 1310	Rochester, Minn.
	KGAR 1370	Tucson, Ariz.
	KALB 1210	Alexandria, La.
4:40-5:00	KOVG 1500	Valley City, N. D.
	KROY 1210	Sacramento, Calif.
	WBNO 1200	New Orleans, La.
4:50-5:10	KEUB 1420	Price, Utah
	KRE 1370	Berkeley, Calif.
	WLAK 1310	Lakeland, Fla.
5:00-5:20	KBST 1500	Big Spring, Tex.
	KIEM 1450	Eureka, Calif.
	WFOY 1210	St. Augustine, Fla.
5:10-5:30	KDON 1210	Del Monte, Calif.
	WMIN 1370	St. Paul, Minn.
	WTAL 1310	Tallahassee, Fla.
5:20-5:40	KTRH 1290	Houston, Texas
	KUMA 1420	Yuma, Ariz.
	WAIR 1250	Winston-Salem, N. C.
5:30-5:50	KFGQ 1370	Boone, Ia.
	KWG 1200	Stockton, Calif.
	WGCM 1210	Gulfport, Miss.
5:40-6:00	KGMB 1320	Honolulu, T. H.
5:50-6:10	KGLO 1210	Mason City, Ia.
	KVCV 1200	Redding, Calif.
6:00-6:20	KHUB 1310	Watsonville, Calif.

The Second Tuesday

2:00-2:20	WBAX 1210	Wilkes Barre, Pa.
2:10-2:20	WDAS 1370	Philadelphia, Pa.
2:20-2:40	WRBL 1210	Richmond, Va.
2:30-2:50	WFBG 1310	Altoona, Pa.
2:40-3:00	WMBG 1210	Richmond, Va.
2:50-3:10	WEBR 1310	Buffalo, N. Y.
3:00-3:20	KDAL 1500	Duluth, Minn.
	WLVA 1200	Lynchburg, Va.
3:10-3:30	KPAC 1260	Port Arthur, Tex.
	WBTM 1370	Danville, Va.
3:20-3:40	WKRC 550	Cincinnati, Ohio
	WHEC 1430	Rochester, N. Y.
	WNAD 1010	Norman, Okla.
3:30-3:50	WMBC 1420	Detroit, Mich.
	WRAX 1370	Williamsport, Pa.
3:40-4:00	KFVS 1210	Cape Girardeau, Mo.
	WJAC 1310	Johnstown, Pa.
3:50-4:10	WTAW 1120	College Station, Tex.
	WBNS 1430	Columbus, Ohio
	WBNY 1370	Buffalo, N. Y.
4:00-4:20	WCOL 1210	Columbus, Ohio
	WBRE 1310	Wilkes Barre, Pa.
4:10-4:30	KLFM 1240	Minot, N. Dak.
	WPAP 1420	Parkersburg, W. Va.
	WPAY 1370	Portsmouth, Ohio
4:20-4:40	KRMD 1310	Shreveport, La.
	WOMT 1210	Manitowoc, Wis.
	WSYR 570	Syracuse, N. Y.
4:30-4:50	KGGA 1270	Decorah, Ia.
	WJAY 610	Cleveland, Ohio
	WNEF 1500	Binghamton, N. Y.
4:40-5:00	KTEM 1370	Temple, Tex.
	KGBU 900	Ketchikan, Alaska
	WGH 1310	Newport News, Va.
4:50-5:10	KGVO 1260	Missoula, Mont.
	KRLH 1420	Midland, Tex.
	WIK 1390	Cleveland, Ohio
	WWSW 1500	Pittsburgh, Pa.
5:00-5:20	KGCX 1450	Wolf Point, Mont.
	KRMC 1370	Jamestown, N. D.
	WSPD 1340	Toledo, Ohio
5:10-5:30	KAST 1370	Astoria, Ore.
	KNET 1420	Palestine, Tex.
	WAVE 940	Louisville, Ky.
5:20-5:40	KCMO 1370	Kansas City, Mo.
	KFJI 1210	Klamath Falls, Ore.
	WXYZ 1240	Detroit, Mich.
5:30-5:50	KIDW 1420	Lamar, Colo.
	KPQ 1500	Wenatchee, Wash.
	WGAR 1450	Cleveland, Ohio
5:40-6:00	KFIO 1120	Spokane, Wash.
	KQV 1380	Pittsburgh, Pa.
	WCAT 1200	Rapid City, S. Dak.
5:50-6:10	KLAH 1210	Carlsbad, N. Mex.
	KORE 1420	Eugene, Ore.
6:00-6:20	KOOS 1200	Marshfield, Ore.
	WLBL 900	Stevens Point, Wis.

The Second Wednesday

2:00-2:20	WMEFJ 1420	Daytona Beach, Fla.
2:10-2:30	WAIM 1200	Anderson, S. C.
2:20-2:40	KVOL 1310	Lafayette, La.
2:30-2:50	WIBG 1370	Memphis, Tenn.
2:40-3:00	WKAQ 1270	San Juan, P. R.
2:50-3:10	WSJS 1310	Winston-Salem, N. C.
3:00-3:20	WCPO 1200	Cincinnati, Ohio
	WMFD 1370	Wilmington, N. C.
3:10-3:30	KFIZ 1420	Pond du Lac, Wis.
	WPAX 1210	Thomasville, Ga.
3:20-3:40	WCLO 1290	Janesville, Wis.
	WRDW 1500	Augusta, Ga.
3:30-3:50	WQBC 1360	Vicksburg, Miss.
3:40-4:00	KAND 1310	Corsicana, Texas
	KPLC 1500	Lake Charles, La.
	WHBC 1200	Canton, Ohio
3:50-4:10	KARK 890	Little Rock, Ark.
	WGPC 1420	Albany, Ga.

4:00-4:20 KFJZ 1370 Fort Worth, Tex.
 WHBU 1210 Anderson, Ind.
 WJNO 1200 W. Palm Beach, Fla.
 4:10-4:30 WBEO 1310 Marquette, Mich.
 WCOC 850 Meridian, Miss.
 WLB 1250 Minneapolis, Minn.
 4:20-4:40 KSO 1430 Des Moines, Ia.
 WOSU 570 Columbus, Ohio
 WKEU 1500 Griffin, Ga.
 4:30-4:50 WEXL 1310 Royal Oak, Mich.
 WHLB 1370 Virginia, Minn.
 4:40-5:00 KPLT 1500 Paris, Tex.
 WJMS 1420 Ironwood, Mich.
 WJRD 1200 Tuscaloosa, Ala.
 4:50-5:10 KFNR 1310 Oklahoma City, Okla.
 WTAX 1210 Springfield, Ill.
 WBIG 1440 Greensboro, N. C.
 5:00-5:20 KFJB 1200 Marshalltown, Ia.
 WEOA 1370 Evansville, Ind.
 5:10-5:30 KPIN 1310 Pampa, Tex.
 WDW 1020 Tuscola, Ill.
 5:20-5:40 KELD 1370 Eldorado, Ark.
 WAYX 1200 Waycross, Ga.
 WKBN 570 Youngstown, Ohio
 5:30-5:50 KDLR 1210 Devils Lake, N. D.
 WADC 1320 Akron, Ohio
 5:40-6:00 KRBC 1420 Abilene, Tex.
 WSAU 1370 Wausau, Wis.
 5:50-6:10 KFPL 1310 Dublin, Texas
 WFAM 1200 South Bend, Ind.
 6:00-6:20 KLCN 1200 Blytheville, Ark.
 WELL 1420 Battle Creek, Mich.
 6:10-6:30 KGBX 1230 Springfield, Mo.
 WMPC 1200 Lapeer, Mich.
 6:20-6:40 KABR 1420 Aberdeen, S. D.
 6:30-6:50 KFJX 1200 Grand Junction, Colo.

The Second Thursday

2:00-2:20 WBSV 1370 Buffalo, N. Y.
 2:10-2:30 WKOK 1210 Sunbury, Pa.
 2:20-2:40 WRAW 1310 Reading, Pa.
 2:30-2:50 WJTN 1210 Jamestown, N. Y.
 2:40-3:00 WTEL 1310 Philadelphia, Pa.
 2:50-3:10 WHIS 1410 Bluefield, W. Va.
 3:00-3:20 WQAN 880 Scranton, Pa.
 3:10-3:30 WLEU 1420 Erie, Pa.
 3:20-3:40 WBLK 1370 Clarksburg, W. Va.
 3:30-3:50 WSAJ 1310 Grove City, Pa.
 3:40-4:00 WJBC 1200 Bloomington, Ill.
 WSAY 1210 Rochester, N. Y.
 3:50-4:10 WHAT 1310 Philadelphia, Pa.
 WLAP 1420 Lexington, Ky.
 4:00-4:20 WHDL 1400 Olean, N. Y.
 WSMK 1380 Dayton, Ohio
 4:10-4:30 KAWM 1600 Gallup, N. M.
 WJIM 1210 Lansing, Mich.
 4:20-4:40 WBBZ 1200 Ponca City, Okla.
 WBOW 1310 Terre Haute, Ind.
 4:30-4:50 KGKL 1370 San Angelo, Tex.
 WCBS 1420 Springfield, Ill.
 4:40-5:00 KRRV 1310 Sherman, Tex.
 WTMV 1500 East St. Louis, Ill.
 4:50-5:10 KGGM 1230 Albuquerque, N. M.
 WHBF 1210 Roek Island, Ill.
 5:00-5:20 KERN 1370 Bakersfield, Calif.
 KGGK 570 Wichita Falls, Tex.
 WTRC 1310 Elkhart, Ind.
 5:10-5:30 KGFI 1500 Corpus Christi, Tex.
 KTRB 740 Modesto, Calif.
 WWAÉ 1200 Hammond, Ind.
 5:20-5:40 KFYO 1310 Lubbock, Tex.
 KJBS 1070 San Francisco, Calif.
 WIBM 1370 Jackson, Mich.
 5:30-5:50 KGHI 1200 Little Rock, Ark.
 KXO 1500 El Centro, Calif.
 WALR 1210 Zanesville, Ohio
 5:40-6:00 KGHF 1320 Pueblo, Colo.
 KIFSL 1260 Chico, Calif.
 WDW5 1370 Champaign, Ill.
 5:50-6:10 KCKB 1500 Tyler, Texas
 KSUN 1200 Lowell, Ariz.
 WBCM 1410 Bay City, Mich.
 6:00-6:20 KGFL 1370 Roswell, N. M.

KGU 750 Honolulu, T. H.
 WBU 1210 Poinette, Wis.
 6:10-6:30 KGIW 1420 Alamosa, Colo.
 KHBC 1400 Hilo, T. H.
 6:20-6:40 KVEC 1200 San Luis Obispo, Calif.
 WGL 1370 Fort Wayne, Ind.

The Second Friday

2:00-2:20 WGNV 1210 Newburgh, N. Y.
 2:10-2:30 WCNW 1500 Brooklyn, N. Y.
 2:20-2:40 WGBB 1210 Freeport, N. Y.
 2:30-2:50 WABY 1370 Albany, N. Y.
 2:50-3:10 WSYB 1500 Rutland, Vt.
 3:00-3:20 WABI 1200 Bangor, Me.
 3:20-3:40 WIBX 1200 Utica, N. Y.
 3:30-3:50 KASA 1210 Elk City, Okla.
 WAGM 1420 Presque Isle, Me.
 3:40-4:00 KWOS 1310 Jefferson City, Mo.
 WNBZ 1290 Saranac Lake, N. Y.
 3:50-4:10 WJBK 1500 Detroit, Mich.
 WMBH 1420 Joplin, Mo.
 WRDO 1370 Augusta, Me.
 4:00-4:20 KIUL 1210 Garden City, Kans.
 WTHT 1200 Hartford, Conn.
 4:10-4:30 KICA 1370 Clovis, N. M.
 WCAZ 1070 Carthage, Ill.
 WNLC 1500 New London, Conn.
 4:20-4:40 WMFG 1210 Hibbing, Minn.
 4:30-4:50 KIUP 1370 Durango, Colo.
 WPAD 1420 Paducah, Ky.
 4:40-5:00 KNOW 1500 Austin, Tex.
 WEAP 1310 Milwaukee, Wis.
 4:50-5:10 WEW 760 St. Louis, Mo.
 WGRC 1370 New Albany, Ind.
 5:00-5:20 KIUN 1420 Pecos, Tex.
 WEBQ 1210 Harrisburg, Ill.
 5:10-5:30 KGEC 1200 Sterling, Colo.
 WCM1 1310 Ashland, Ky.
 5:20-5:40 KMAC 1370 San Antonio, Tex.
 WJW 1210 Akron, Ohio
 5:30-5:50 WIL 1200 St. Louis, Mo.
 WLBC 1310 Muncie, Ind.
 5:40-6:00 KTOK 1370 Oklahoma City, Okla.
 WKBB 1500 E. Dubuque, Ill.
 5:50-6:10 KANS 1210 Wichita, Kans.
 WHBY 1200 Green Bay, Wis.
 6:00-6:20 WACO 1420 Waco, Tex.
 6:10-6:30 WJBL 1200 Decatur, Ill.
 6:20-6:40 KRQA 1310 Santa Fe, N. M.
 WHDF 1370 Calumet, Mich.
 6:30-6:50 KGDE 1200 Fergus Falls, Minn.

The Second Saturday

2:00-2:20 WMFR 1200 High Point, N. C.
 2:10-2:30 WMFO 1370 Deatur, Ala.
 2:20-2:40 WSOC 1210 Charlotte, N. C.
 2:30-2:50 WTJS 1310 Jackson, Tenn.
 2:40-3:00 W81X 1210 Nashville, Tenn.
 2:50-3:10 WROL 1310 Knoxville, Tenn.
 3:00-3:20 KOTN 1500 Pine Bluff, Ark.
 WBLY 1210 Lima, Ohio
 WQAM 560 Miami, Fla.
 3:10-3:30 KWYO 1370 Sheridan, Wyo.
 WPRP 1420 Ponce, F. R.
 3:20-3:40 KGCU 1240 Mandan, N. Dak.
 WNEI 1290 San Juan, F. R.
 3:30-3:50 WAML 1440 Houston, Tex.
 WKIV 1310 Laurel, Miss.
 3:40-4:00 KRGV 1260 Richmond, Ind.
 WFOR 1370 Westaco, Tex.
 3:50-4:10 KNEI 1500 Hattiesburg, Miss.
 WEID 1420 Brady, Tex.
 4:00-4:20 WGBF 630 Rocky Mount, N. C.
 KVSO 1210 Evansville, Ind.
 WFDE 1310 Ardmore, Okla.
 WFTC 1200 Flint, Mich.
 4:10-4:30 KFQD 780 Kinston, N. C.
 KONO 1370 Anchorage, Alaska
 KONO 1370 San Antonio, Tex.
 WKBZ 1500 Muskegon, Mich.
 4:20-4:40 KRLC 1390 Lewiston, Idaho
 KTSM 1310 El Paso, Tex.
 WBHP 1200 Huntsville, Ala.

4:30-4:50	KOCA	1210	Kilgore, Tex.
	KUJ	1370	Walla Walla, Wash.
4:40-5:00	KCMC	1420	Texarkana, Texas
	KRNR	1500	Roseburg, Ore.
4:50-5:10	KEEN	1370	Seattle, Wash.
	KWTN	1210	Watertown, S. Dak.
5:00-5:20	KGFF	1420	Shawnee, Okla.
	KIT	1310	Yakima, Wash.
5:10-5:30	KBTM	1200	Paragould, Ark.
	KRKO	1370	Everett, Wash.
5:20-5:40	KPRO	1370	Longview, Tex.
	KGEZ	1310	Kailispel, Mont.
5:30-5:50	KBIX	1500	Muskogee, Okla.
	KFXD	1200	Nampa, Idaho
5:40-6:00	KFJM	1410	Grand Forks, N. D.
	KXRO	1310	Aberdeen, Wash.
5:50-6:10	KGY	1210	Olympia, Wash.
6:00-6:20	KINY	1310	Juneau, Alaska
6:10-6:30	KMED	1410	Medford, Ore.



Phillips Lord interviews a parrot which took an important part in the solving of one of the crimes which he reported in the "Gang Busters" Program. The parrot's ability to repeat scraps of conversation in Italian picked up at racketeer's meetings helped to convict a notorious gangster.

The Ray Perkins show, "Hi, There, Audience," has been switched to 7 to 7:30 pm, EST, on the WOR—Mutual Network.

Carl and Anne Eder, Pouch —A—, Willmar, Minn. wish to exchange SWL cards with listeners in every country.

Spotting Sun Spots

ON SUNNY afternoons a telescope, pointed at the sun, may be seen protruding from one of the sixth-floor windows of Broadcasting House, London. Its appearance indicates that the staff of the Overseas and Engineering Departments of the BBC are taking observations of the number and position of sunspots—routine work that is carried out daily when the state of the weather permits.

Through the telescope an image of the sun is thrown upon a square of paper, the sunspots being seen as black specks, either isolated or in groups. Their positions are plotted on a chart, and thus a day-to-day record of a spot's progress across the face of the sun is obtained. By this somewhat rough and ready method the general trend of sunspot activity can be watched, and subsequent checking with the Royal Observatory at Greenwich provides detailed information about its exact magnitude.

Listeners to the BBC's short-wave transmission from Daventry benefit in an indirect way from the use made of this information. As is now well known, solar activity greatly affects the ionospheric conditions governing short-wave transmission, and plays a large part in determining the frequencies to be used. The choice of the dates on which frequency changes are to be made is also governed by the general trend of solar activity, and advance information is sometimes provided by these simple observations.

WEOA in Evansville, Ind., 1370 kcs., will join the CBS this fall, as soon as telephone lines are available.

Call-o-Gram

Solution to Call-o-Gram printed on page 8.

WWNC PHILCO DX W
KMJ WKBI MAINE E
BC WSEN KWK CCIW
G HARTFORD K WN
CONNECTICUT K
C M CNRO S WKY
KGW WRC WCOACHNC
A YVIRC Q KXA

"I Disagree"

"I do not agree with the statement of Julius Orosz in the Amateur Column in the September issue of RA-DEX," parries Walter C. Snyder, 1401 Logan St., S. E., Grand Rapids, Mich. "If Mr. Orosz thinks he can pick up station PP in Paris by simply turning the dial to 959 kcs, and turning up the volume control, I believe he has another think coming. Atmospheric conditions and the season have a thing or two to say about that.

"Amateur DX seems too easy for me. One can pick up foreign DX nearly any time he pleases, and that is certainly more cut and dried than waiting for weeks for a station on the broadcast band to come through.

"I grant that it is easy to build up a log of 20 meter stations; it takes only a few minutes to identify a new amateur station, but a large log on the BCB represents much more work than one of similar proportions on the 20 meter band.

"I feel that, on the broadcast band, reception of a foreign station really means something and is not an every day occurrence."

Foreign Notes

(Continued from page 11)

using a kilowatt and announcing as "Ultimas Noticias." The address is Compania 1258.

(It should be noted that in referring to Chilean stations it is not necessary to give the frequency on which they work. All that is necessary is to add a cypher to the call letters to determine the frequency).

A 200 watt station is under construction at Coquimbo; it is CB96, operated by Puerta Brothers, Aldunate 1381. Two stations are being built at Chillan. One of these, CC127, 100 watts, is owned by Rafael Barrios, Arauco entre Const-Roble, and the other, CC133, 100 watts, is operated by Miquel Arrau, 5 de Abril 587. CB150, Santiago, 10 kw., is under construction.

Victor Wiedmaier's CB130, Santiago, is not in operation at the present time, while CB144D of Santiago and CB146 of San Felipe have been deleted.

In Europe

Three new stations are now operating, but on comparatively low power for transatlantic reception. Gorlitz, Germany, 5 kw, is on 1231 kcs. Warsaw No. 2, Poland, 5 kw, employs the 1360 kcs. frequency, and a 250 watt station owned by the University of Bucharest, Roumania, transmits on 1411.

Only two major frequency changes are noted. Moscow No. 2, 100 kw., has moved from 271 to 232 kcs., and RW53, Leningrad No. 1, 100 kw., shifted from 232 to 271 kcs.

Power changes are recorded from Sofia, Bulgaria, 848 kcs, now one kilowatt, and Riga, Latvia, 1258 kcs, owned by Rigas Radiofons, has increased to 15 kw.

Four of the French stations have boosted power. Alpes-Grenobles, 583



Gabriel Heatter, veteran metropolitan journalist and top-notch radio news reporter, is shown here in a characteristic pose.

kcs, (1 Rue Hauguelin), is now 20 kw. Agen, 832, now has 1.5 kw. Bordeaux-Lafayette, Hotel des PTT, 220 Chemin de Tondeu, Bordeaux, on 1077, has increased to 35 kw. "Radio Normandie," Societe Anonyme, Siege Social, Fecamp, working on 1113 kcs, now uses 15 kw. power.

Naples, Italy on 1104 boosted its wattage to 10 kw. The Berlin long wave station, "Deutschlandsender," 191 kcs, will increase from 60 to 150 kw.

Independent programs on different frequencies, designed to serve listeners in Wales and the West of England, are now radiated by the BBC from its transmitting station at Washford Cross (Somerset), where two transmitters are available. Under the new arrangement one transmitter of 70 kw. power radiates the Welsh programs, and the other transmitter, using 50 kw,

transmits the West of England program.

As a result of this development, certain changes in the frequencies of other BBC stations were necessary. A full list of the British stations is given below:

- 200 kcs., Droitwich, 150 kw., Nat'l program.
- 668 kcs., Moorside Edge, 70 kw., North program.
- 767 kcs., Westerglen, 70 kw., Scottish program.
- Burghead, 60 kw., Scottish program.
- 804 kcs., Washford Cross, 70 kw., Welsh program.
- Penmon, 5 kw., Welsh program.
- 877 kcs., Brookmans Park, 70 kw., Regional program.
- 977 kcs., Lisangarvey, 100 kw., N. Ireland program.
- 1013 kcs., Droitwich, 70 kw., Midland program.
- 1050 kcs., Washford Cross, 50 kw., W. England program.
- 1122 kcs., Newcastle, 1 kw., Newcastle program.
- 1149 kcs., Brookmans Park, 20 kw., Nat'l program.
- Moorside Edge, 20 kw., Nat'l program.
- Westerglen, 50 kw., Nat'l program.
- 1285 kcs., Aberdeen, 1 kw., Aberdeen program.
- 1474 kcs., Plymouth, 300 watts, Regional and W. England program.
- Bournemouth, 1 kw., same as Plymouth.

A number of articles of interest to the DXer who fishes in the broadcast band for foreign stations have appeared in RADEX. A few of the more important titles are "Tuning the trans-Pacific Stations" in Issue No. 48, and another article with the same name in Issue No. 65. "Experience with the JO—Stations" was written in No. 73. "How to Tune the Europeans" appeared in No. 90, and "Europeans Worth Trying For" can be read in No. 92.

Night Life

(Continued from Page 25)

ton, Alta. "This cannot be blamed on the station owners, as many were reduced from 500 to 100 watts under the old CRC. Furthermore, al-

though the equipment of the Mexican stations is more powerful, I do not agree that it is more modern. When their power was reduced, many of the Canadian stations put in brand new equipment. It took years for the NBC and CBS to reach their present standard in the United States, and the new CBC must be given time to develop broadcasting in Canada. With the co-operation of the listeners, it shouldn't be long before we are on a par with any other country in the world."

DX Reports

"DX reception during the last season was fair," reviews Harry V. Adams, Bay View, N. S. "During a period of six months, I was able to verify LR1, LS2, PRE8, Fecamp, Paris, Rennes, Nice, Lille, Toulouse, Marseilles, Belfast, Strasbourg, Milan, Munich, Cologne, HJ3ABX, KGMB, KHBC, 1YA and 3LK. In December and January alone, I logged 27 trans-Atlantic stations, including Leipzig, EAJ1, Lyons, Athlone and Falkirk. My best domestic veries were from CKWX, CJCA, CJRM, CMHJ, XET and KUJ. Receiving equipment was a 6-tube Stewart-Warner set, an aerial of Litz wire 100 feet long, and a chemical ground."

"Verifications have come in from 3SR, 2NR, 3LK, 2UE, 2HD, 2CH, 2UW and 4QN," reports Anthony C. Tarr, 909 W. Lee St., Seattle, Wash. "The latter station is owned by the government and does not require reply coupons from listeners who want veries. 3SR offered to put on a special American DX program next fall and I am going to line it up for the UDXC."

"I just started DXing at the beginning of the past season," admits Francis T. Coradetti, 212 Merion Ave., Narberth, Pa., "and my log stands at 384 stations heard, with 221 verified. Some of my best catches are CRCV, KRNR, KWYO,

KFAC, KFVB, KGDE, KOY, KECA and KOH. Contrary to your lists, WGH has verification stamps and now I have one."

Scrapbook

(Continued from Page 34)

ible souvenirs of nearly every station which I have heard. Be they the handsome diplomas of LR5 and CX26, the distinctive letterheads of RXKR and WAGF, the awful carbon copies of KGMP or the simple postcards which I prepared, every verification receives an honored place in my file.

In the years to come, as in the past, I shall enjoy looking them over and recalling the circumstances under which they were obtained. I will remember the trouble I had in coaxing replies from WEHC, WSAJ and KSEI. I may get a chuckle from the simple replies from the three Ohio outlaws. I shall probably relive the thrill of hearing KRE and RXKR under most adverse conditions. Certainly I shall always recall the exciting moments when LR5 first crashed through KOA with an R7 signal, when Algiers pushed through the maze on 940 kcys, one January evening two years ago, when 2KY became my first Aussie and Poste Parisien was logged for my first European, and when I heard each of the other 30 transoceanic catches.

Yes, I am sure that the process of verifying stations is very much worth while. I know that it has added a great deal to the pleasure which I have derived from DXing, and I know that the custom will continue as long as I spin a dial on an early-morning trick.

The Sacramento station KFBK was authorized by the FCC to increase its power to 10,000 watts on the 1490 kc channel.

WHAT'S ON THE AIR TONIGHT

Fill in the calls and frequencies of the stations through which you best receive the network programs. You can then turn quickly to the one that has the feature you want.

Network	Stations
Canadian (CBC)	
Columbia (C)	
Mutual (M)	
National Red (R)	
National Blue (B)	

Time: E Eastern; C Central; M Mountain; P Pacific

MONDAY

E-5:35 p.m., C-4:35, M-3:35, P-2:35
C — Baseball Resume
 KFH KGKO KLRA KMBC KNOW
 KOMA KRLL KRNT KSCJ KTRH
 KTSB KTUL WABC WACG WADC
 WAIM WALA WBBM WBIG WBNS
 WBRC WBT WCAU WCHS WCOA
 WCOG WDAE WDBJ WDBO WFNQ
 WDOD WDRC WFEI WFAM WFBM
 WFEA WGBI WGH WGST WHIO
 WHP WIBX WJAS WJNO WJR
 WJSV WKBW WKBH WKBW WKRC
 WLAC WMAA WMAZ WMBD
 WMBR WMMN WNAK WNOX
 WOR WORC WPAR WRBO WQAM
 WREC WRVA WFSB WJSU

E-5:45 p.m., C-4:45, M-3:45, P-2:45
B — Lowell Thomas
 CRCT KDKA WBAL WBZ WBZA
 WFLA WIOD WJAX WJZ WLW
 WMAL WOOD WRVA WSYP WTAM
 WXYZ

E-7:00 p.m., C-6:00, M-5:00, P-4:00
C — Poetic Melodies; Jack Fulton
 WABC WADC WBT WCAO WCAU
 WDRC WEAN WEEI WFBL WGR
 WHSC WHK WJAS WJR WJSV
 WKRC WOKO WSPD WTOG WVVV

R — Amos 'n' Andy
 KYW WBEN WCAE WCSH WFAF
 WEEI WFBW WGY WJAR WLW
 WRC WTAG WTIC

E-7:15 p.m., C-6:15, M-5:15, P-4:15
R — Uncle Ezra's Radio Station
 KARK KFYR KGBX KGNC KPBC
 KSTP KTBS KTHS KVOO KYW
 WBAP WBEN WCAE WCKY WCOL
 WCSH WDAF WDAY WFAF WBBB
 WFAA WFBW WGBF WGY WHO
 WIBA WIRE WJAR WKY WMAQ
 WNAC WOAI WOOD WOV WRC
 WTAG WTAM WTIC WTMJ

E-7:30 p.m., C-6:30, M-5:30, P-4:30
B — Lum and Abner
 WBZ WBZA WENR WJZ WLW
 WMC WSM WSYR

E-7:45 p.m., C-6:45, M-5:45, P-4:45
C — Boake Carter
 KMBC KMOX KOMA KRLL WABC
 WBBM WBT WCAU WCCO WDRC
 WEAN WFBL WGR WHAS WHK
 WJAS WJR WJSV WKRC WNAC

E-8:00 p.m., C-7:00, M-6:00, P-5:00
C — Horace Heidt and Orchestra
 KDB KERN KFAB KFBK KFH
 KFPY KFRC KGB KHJ KLRA KLZ
 KMBC KMJ KMOX KOIN KOL
 KRLL KRNT KSL KTRH KTSB
 KTUL KVI KWG WABC WBBM
 WBRC WBT WCAO WCAU WCCO
 WDRC WFBL WFBM WGR WGST
 WHAS WHK WJAS WJR WJSV
 WKRC WLAC WMBR WNAC WNAX
 WOKO WREC WWL

R — Burns and Allen
 CRCT KYW WBEN WCAE WCSC
 WCSH WFAF WFBW WFLA WGY
 WHO WIOD WIRE WIS WJAR
 WJAX WLW WMAQ WNAC WPTF
 WRC WRVA WSOC WTAG WTAM
 WTAR WTIC WWJ

E-8:30 p.m., C-7:30, M-6:30, P-5:30
C — Pick and Pat
 KFAB KMBC WABC WADC WBBM
 WBT WCAO WCAU WDRC WEAN
 WFBL WGR WGST WJEC WHK
 WHP WICC WJAS WJR WJSV
 WKRC WLWZ WMAA WNAC WOKO
 WORC WSPD

R — Voice of Firestone
 CFCE CRCT KFYR KPBC KSD
 KSTP KTBS KVOO KYW WAVE
 WBEN WCAE WCSC WCHS WDAF
 WDAY WFAF WFCB WEEI WFAA
 WFBW WFBW WFLA WGY WHO
 WIBA WIOD WIRE WIS WJAR
 WJAX WJDX WKY WMAQ WMC
 WOAI WOW WPTF WRC WRVA
 WSB WSM WSMB WSOC WTAG
 WTAM WTAR WTIC WTMJ WWJ
 WWNC

E-9:00 p.m., C-8:00, M-7:00, P-6:00
R — Fibber McGee and Molly
 KFYR KPBC KSD KSTP KTBS
 KVOO KYW WAVE WBEN WCAE
 WCOL WCHS WDAF WDAY WFAF
 WFCB WFAA WFBW WFLA WGY
 WHO WIBA WIOD WIRE WIS
 WJAR WJAX WJDX WLW WMAQ
 WMC WNAC WOAI WOOD WOW
 WPTF WRC WSB WSM WSMB
 WSOC WSUN WTAG WTAM WTAR
 WTIC WTMJ WWJ WWNC

E-9:30 p.m., C-8:30, M-7:30, P-6:30
R — Phil Spitalny's Girl Orchestra
 CFCE CRCT KDYL KFI KGHL

KGIR KGO KGW KHQ KOA KOMO
 KPBC KSD KSTP KVOO KYW
 WAVE WBEN WCAE WCHS WDAF
 WFAF WFAA WFBW WFLA WGY
 WHO WIBA WIOD WIRE WIS
 WJAR WJAX WKY WLW WMAQ
 WMC WNAC WOAI WOW WPTF
 WRC WRVA WSB WSM WSMB
 WTAG WTAM WTAR WTIC WTMJ
 WWJ

E-10:00 p.m., C-9:00, M-8:00, P-7:00
R — Contented Program
 CFCE CRCT KDYL KFI KGW KHQ
 KOA KOMO KPO KPBC KSD KYW
 WBEN WCAE WCHS WDAF WFAF
 WEEI WFBW WFLA WGY WHO
 WIOD WIS WJAR WJAX WKY
 WMAQ WMC WOAI WOW WPTF
 WRC WRVA WSB WSM WTAG
 WTAM WTAR WTIC WWJ WWNC

C — Wayne King and Orchestra
 KDB KERN KFAB KFBK KFPY
 KFRC KGB KHJ KLZ KMBC KMJ
 KMOX KOIN KOL KRNT KSL KVI
 KWG WAAB WABC WADC WBBM
 WBNS WBT WCAO WCAU WCCO
 WDRC WEAN WFBL WFBM WHAS
 WHK WIBW WJAS WJR WJSV
 WKBW WKRC WOKO WSPD WWL

E-10:30 p.m., C-9:30, M-8:30, P-7:30
R — Burns and Allen
 KARK KDYL KFBK KFI KFYR
 KFBX KGHL KGIR KGNC KGO
 KGW KHQ KMJ KOA KOMO KPO
 KPBC KSD KSTP KTAR KTBS
 KVOO KWG WAVE WDAF WDAY
 WFCB WFAA WIBA WJDX WKY
 WMC WOAI WOV WSB WSMB
 WTMJ

E-11:00 p.m., C-10:00, M-9:00, P-8:00
C — Poetic Melodies; Jack Fulton
 KERN KFAB KFBK KFPY KPBC
 KGB KHJ KLRA KLZ KMBC KMOX
 KOIN KOL KOMA KRLL KRNT
 KSL KTRH KTSB KVI WLAB
 WBRC WCCO WFBM WGST WLCB
 WREC WWL

R — Amos 'n' Andy
 KDYL KFI KGW KHQ KOA KOMO
 KPO KPBC KSD WBAF WDAF
 WHO WKY WLW WMC WOAI WOW
 WSB WSM WSMB WTAM WWJ

MONDAY (Continued)

E-11:15 p.m., C-10:15, M-9:15, P-8:15

C — Boake Carter

KFPY KLZ KNX KOIN KOL KSFO KSL KVI

E-11:30 p.m., C-10:30, M-9:30, P-8:30

C — Pick and Pat

KFPY KGKO KLRA KLZ KMOX KNX KOIN KOL KOMA KRLD KRNT KSCJ KSFO KSL KTUL KVI KWKH WACO WBRC WCCO WFBM WHAS WLAC WREC

TUESDAY

E-6:35 p.m., C-5:35, M-4:35, P-3:35

C — Baseball Resume, See Monday

E-6:45 p.m., C-5:45, M-4:45, P-3:45

B — Lowell Thomas, See Monday

E-7:00 p.m., C-6:00, M-5:00, P-4:00

C — Poetic Melodies, See Monday

R — Amos 'n' Andy, See Monday

B — Easy Aces

KDKA KDYL KFI KGW KHQ KOA KOIL KOMO KPO KSO KWK WBAL WBZ WBZA WCKY WENR WFIL WGAR WHAM WHIO WIRE WJZ WMAL WMT WSYR WXYZ

E-7:30 p.m., C-6:30, M-5:30, P-4:30

B — Lum and Abner, See Monday

E-8:00 p.m., C-7:00, M-6:00, P-5:00

C — Mark Warnow Orchestra

CFRB KFAB KFH KFPY KGVO KLRA KLZ KNBC KMOX KNW KNX KOIN KOL KOMA KRLD KRNT KSCJ KSFO KSL KTRH KTSa KTUL KVI WABC WADC WBBM WBNS WBRC WBT WCAO WCAU WDAE WDBJ WDNC WDRC WDEI WFBL WFBM WGR WGST WHAS WHEC WHK WHB WJAS WJR WJSV WKRC WLX WNAK WWO WORC WPRO WQAM WREC WVV

R — Johnny with Russ Morgan

KFYR KPRC KSD KSTP KTBS KTHS KVOO KYW WAVE WBAP WBEN WCAE WCHS WDAF WDAY WEAF WECB WFER WFLA WGY WHO WIBA WIOD WIS WJAR WJAX WJDX WKY WLW WMAQ WMC WNAC WOV WPTF WHC WRVA WSB WSM WSNB WSOC WSNW WTAG WTAM WTAR WTIW WTMJ WJZ WVNC

B — Husbands and Wives

KDKA KECA KEN KFSD KGA KGO KJR KLO KOIL KSO KVOD KWK WABY WBAL WBZ WBZA WCKY WEAN WEBR WFIL WGAR WHAM WICC WJZ WLS WMAL WMT WREN WSYR WXYZ

E-8:30 p.m., C-7:30, M-6:30, P-5:30

R — Wayne King and Orchestra

KFYR KPRC KSD KSTP KTBS KVOO KYW WAVE WBAP WBEN WCAE WCKY WCHS WDAF WDAY WEAF WECB WFER WFBM WGR WHAS WHEC WHK WHB WJAS WJR WJSV WKRC WLAC WLX WMAQ WMC WOA

WOW WRC WSB WSM WSWB WTAG WTAM WTIW WTMJ WJZ

B — Edgar Guest, It Can Be Done

KDKA KOIL KSO KWK WBAL WBZ WBZA WFL WGAR WHAM WJZ WLS WLW WMAL WMT WREN WSYR WXYZ

E-9:00 p.m., C-8:00, M-7:00, P-6:00

C — Al Pearce and Gang

CFRB CKAC KFAB KFH KGKO KLRA KMBC KMOX KOMA KRLD KRNT KSCJ KTRH KTSa KTUL KWKH WABC WACO WADC WALA WBBM WBIG WBNS WBRC WBT WCAO WCAU WCCO WDAE WDBJ WDBO WDNC WDDO WDRC WEAN WFBL WFBM WFEA WGST WHAS WHEC WHK WHB WJAS WJR WJSV WKRB WKBN WKBW WKRZ WLAC WLH Z WMAS WMBD WMBG WMBR WMMN WNAC WNAK WNB F WNAX WOC WOKO WORC WOWO WPG WQAM WREC WSBT WSFA WSJS WSPD WTOG WWL

R — Vox Pop; Sidewalk Interviews

KSD KYW WBEN WCAE WCKY WCHS WDAF WEAF WEEI WFER WGY WHO WIRE WJAR WMAQ WOV WRC WTAG WTAM WTIW WJZ

B — Ben Bernie and Orchestra

KDKA KDYL KFI KFSD KFYR KGW KHQ KOA KOIL KOMO KPO KPRC KSO KSTP KTAR KTBS KVOO KWK WAVE WBAL WBAP WBZ WBZA WDAY WECB WFLA WFLA WGAR WHAM WIBA WIOD WIS WJAX WJDX WJZ WKY WLS WLW WMAL WMC WMT WOA WPTF WREN WRVA WSB WSM WSNB WSOC WSYR WTAR WTMJ WWNC WXYZ

E-9:30 p.m., C-8:30, M-7:30, P-6:30

C — Benny Goodman Orchestra

KFAB KFH KFPY KGKO KLRA KLZ KMBC KMOX KNX KOIN KOL KOMA KRLD KRNT KSCJ KSFO KSL KTRH KTSa KTUL KVI KVOO KWKH WABC WACO WADC WALA WBBM WBIG WBNS WBRC WBT WCAO WCAU WCCO WDAE WDBJ WDBO WDNC WDDO WDRC WDEI WFBL WFBM WGST WHAS WHEC WHIO WHK WHB WJAS WJR WJSV WKBN WKBW WKRC WLAC WLX WMAQ WMBD WMBG WMBR WNAK WNB F WNAX WOC WOKO WORC WOWO WPG WPRO WQAM WREC WSBT WSFA WSJS WTOG WWL

R — Packard Program

CRCT KDYL KFI KFYR KGW KHQ KOA KOMO KPO KPRC KSD KSTP KTBS KTHS KVOO KYW WAVE WBAP WBEN WCAE WCKY WCHS WDAF WDAY WEAF WECB WEEI WFER WFLA WGY WHO WIBA WIOD WIE WIS WJAR WJAX WJDX WKY WMAQ WMC WOA WOV WPTF WRC WRVA WSM WSNB WSOC WTAG WTAM WTAR WTIW WTMJ WJZ WWNC

E-10:30 p.m., C-9:30, M-8:30, P-7:30

R — Jimmy Fidler Hollywood Gossip

KDYL KFI KGW KHQ KOA KOMO

KPO KSD KTAR KYW WBEN WCAE WCHS WDAF WEAF WFER WGY WHO WJAR WLW WMAQ WNAC WOOD WOV WRC WTAG WTAM WTIW WJZ

E-10:45 p.m., C-9:45, M-8:45, P-7:45

R — Vic and Sade

KDYL KFI KGW KHQ KOA KOMO KPO KSD KSTP KYW WCAE WCHS WDAF WEAF WFER WGY WHO WIRE WLW WMAQ WNAC WOV WRC WTAG WTAM WTIW WJZ

E-11:00 p.m., C-10:00, M-9:00, P-8:00

C — Poetic Melodies, See Monday

R — Amos 'n' Andy, See Monday

WEDNESDAY

E-6:35 p.m., C-5:35, M-4:35, P-3:35

C — Baseball Resume, See Monday

E-6:45 p.m., C-5:45, M-4:45, P-3:45

B — Lowell Thomas, See Monday

E-7:00 p.m., C-6:00, M-5:00, P-4:00

C — Poetic Melodies, See Monday

R — Amos 'n' Andy, See Monday

B — Easy Aces, See Tuesday

E-7:15 p.m., C-6:15, M-5:15, P-4:15

R — Uncle Ezra, See Monday

E-7:30 p.m., C-6:30, M-5:30, P-4:30

B — Lum and Abner, See Monday

E-7:45 p.m., C-6:45, M-5:45, P-4:45

C — Boake Carter, See Monday

E-8:00 p.m., C-7:00, M-6:00, P-5:00

C — Cavalcade of America

KDB KERN KFAB KFBK KFPY KPRC KGB KHJ KLZ KMBC KMJ KMOX KOIN KOL KRLD KRNT KSL KVI KWG WABC WBBM WBNS WCAU WCCO WDRC WEAN WFBL WFBM WGR WHAS WHEC WHK WJAS WJR WJSV WKRC WLAC WMBG WNAC WOKO WTOG WWL

R — One Man's Family

KDYL KFI KFYR KGW KHQ KOA KOMO KPO KPRC KSD KSTP KTAR KTBS KTHS KVOO KYW WAFI WAVE WBAP WBEN WCAE WCHS WDAF WDAY WEAF WECB WEEI WFAA WFER WFLA WGY WHO WIBA WIOD WIS WJAR WJAX WJDX WKY WLW WMAQ WMC WOA WOV WPTF WRC WRVA WSB WSM WSNB WSOC WSNW WTAG WTAM WTAR WTIW WTMJ WJZ WVNC

E-8:30 p.m., C-7:30, M-6:30, P-5:30

C — Eddie Cantor; Deanna Durbin

CFRB CKAC KFAB KFH KLRA KMBC KMOX KOMA KRLD KRNT KSCJ KTRH KTSa KTUL KWKH WABC WADC WBBM WBNS WBRC WBT WCAO WCAU WCCO WDAE WDBJ WDBO WDRC WEEI WFBL WFER WGR WGST WHAS WHEC WHK WHB WJAS WJR WJSV WKRC WLAC WLX WMAQ WMC WMBD WMBG

Wednesday (Continued)

WMBR WNAX WNOX WOKO WORC
WOWO WPG WPRO WQAM WREC
WWL

R — Wayne King, See Tuesday

E-9:00 p.m., C-8:00, M-7:00, P-6:00
C — Kostelanetz

KDB KERN KFAB KFBK KFH
KFPY KFCR KGB KGKO KGBM
KHJ KLKA KLZ KMBC KMJ KMOX
KOH KOIN KOL KOMA KRLD
KRNT KSCJ KSL KTRH K TSA
KTUL KVI KVOR KWG KWKH
WABC WACO WADC WALA WBBM
WBIG WBNS WBRC WBT WCAO
WCAU WCCO WCOA WDAE WDBG
WDBO WDNC WDOD WDRC WEAN
WFBL WFBM WFEA WGST WHAS
WHCC WHK WHF WIBW WIBC
WICC WISN WJAS WJR WJSV
WKBN WKBW WKRC WLAC WLZB
WMA5 WMBD WMBG WMBR
WNAC WNAX WNBW WNOX WOC
WOKO WORC WOWO WPG WQAM
WREC WSFA WSJS WSPD WTCC
WWL

R — Town Hall Tonight

KFYR KPRC KSD KSTP KTBS
KTHS KV00 KY WAVE WHEN
WCAE WCSH WDAF WDAY WEAF
WEBC WEEI WFAA WFBW WFLA
WGY WHO WIBA WIOD WIS WJAR
WJAX WJDX WKY WLW WMAQ
WMC WOAI WOW WPTF WRC WSB
WSM WSMB WSOC WTAG WTAM
WTRW WTIC WTMJ WWJ WWL

E-9:30 p.m., C-8:30, M-7:30, P-6:30

C — Jessica Dragonette

KDB KERN KFAB KFBK KFH
KFPY KFCR KGB KGMB KHJ
KLRA KLZ KMBC KMJ KMOX
KOIN KOL KOMA KRLD KRNT
KSL KTRH K TSA KTUL KVI KWKH
WABC WBBM WBNB WBRC
WBT WCAO WCAU WCCO WDAE
WDBJ WDBO WDRC WEAN WFBL
WFBM WGST WHAS WHCC WHK
WICC WISN WJAS WJR WJSA
WKBN WKBW WKRC WLAC WLZB
WMBG WMBR WNAC WOKO WORC
WOWO WQAM WREC WTCC WWL

E-10:00 p.m., C-9:00, M-8:00, P-7:00

C — Crime Crusade; Phil Lord

KDB KERN KFAB KFBK KFH
KFPY KFCR KGB KHJ KLRA KLZ
KMBC KMJ KMOX KOIN KOL
KOM A KRLD KRNT KSL KTRH
K TSA KTUL KVI KWG KWKH
WABC WACO WBBM WBNB WBRC
WBT WCAO WCAU WCCO WDAE
WDBJ WDBO WDRC WEAN WFBL
WFBM WGST WHAS WHCC WHK
WICC WISN WJAS WJR WJSV
WKBN WKBW WKRC WLAC WLZB
WMBG WMBR WNAC WOKO WORC
WOWO WQAM WREC WTCC WWL

R — Your Hit Parade

KDYL KEX KFI KFYR KGHL
KGHR KGU KGW KHQ KOA KOMO
KPO KPRC KSD KSTP KTAR KTBS
KTHS KV00 KY WAVE WCAE
WCSB WCSH WDAF WDAY WEAF
WEBC WFAA WFBW WFLA WGY
WHO WIBA WIOD WIS WJAR
WJAX WJDX WKY WLW WMAQ

WMC WNAC WOAI WOW WPTF
WRC WRVA WSB WSM WSMB
WSOC WSUN WSYR WTAG WTAM
WTAR WTIC WTMJ WWJ WWNC

E-11:00 p.m., C-10:00, M-9:00, P-8:00

C — Poetic Melodies, See Monday

R — Amos 'n' Andy, See Monday

E-11:15 p.m., C-10:15, M-9:15, P-8:15

C — Boake Carter, See Monday

THURSDAY

E-6:35 p.m., C-5:35, M-4:35, P-3:35

C — Baseball Resume, See Monday

E-6:45 p.m., C-5:45, M-4:45, P-3:45

B — Lowell Thomas, See Monday

E-7:00 p.m., C-6:00, M-5:00, P-4:00

C — Poetic Melodies, See Monday

R — Amos 'n' Andy, See Monday

B — Easy Aces, See Tuesday

E-7:30 p.m., C-6:30, M-5:30, P-4:30

C — "We, The People,"

Station list not available

B — Lum and Abner, See Monday

E-8:00 p.m., C-7:00, M-6:00, P-5:00

R — Rudy Vallee's Variety Hour

CFBC CRCT KDYL KFI KFYR
KGW KHQ KOA KOMO KPO KSD
KSTP KTAR KY WAVE WCAE
WCSH WDAF WDAY WEAF WEBC
WEEI WFBW WGY WHO WJAR
WLW WMAQ WOW WRC WTAM
WTIC WTMJ WWJ

E-8:30 p.m., C-7:30, M-6:30, P-5:30

M — Guy Lombardo Orchestra

OKLW KDB KDON KFEL KFCR
KFXM KGB KGDM KHJ KPMC
KSO KV00E KWKXNO WABY WRAL
WFIL WGAR WKBW WMT WOL
WOR WSAI WSYR WWSW
Also on Canadian Network

E-9:00 p.m., C-8:00, M-7:00, P-6:00

C — Major Bowes' Amateurs

CFRB CKAC KDB KERN KFAB
KFBK KFH KFPY KFCR KGB
KGKO KLRA KLZ KMBC KMJ
KMOX KOIN KOL KOMA KRLD
KRNT KSCJ KSL KTRH K TSA
KTUL KVI KVOR KWG KWKH
WABC WACO WADC WALA WBBM
WBIG WBNS WBRC WBT WCAO
WCAU WCCO WCOA WDAE WDBJ
WDBO WDNC WDOD WDRC WEAN
WFBL WFBM WFEA WGST WHAS
WHCC WHK WHF WIBW WIBC
WICC WISN WJAS WJR WJSV
WKBN WKBW WKRC WLAC WLZB
WMA5 WMBD WMBG WMBR
WMXN WNAC WNAX WOC WOKO
WORC WOWO WPG WQAM WREC
WSFA WSJS WSPD WTCC WWL

R — Maxwell House Show Boat

KDYL KFI KFSB KFYR KGHL
KGIR KWK KHQ KOA KOMO KPO
KPRC KSD KSTP KTAR KTBS
KY WAVE WCAE WCSB WCSH
WDAF WDAY WEAF WEBC WEEI
WFBW WFLA WGY WHO WIBA
WIOD WIS WJAX WJDX WKY
WLW WMAQ

WJAR WJAX WJDX WKY WMAQ
WMC WOAI WOW WPTF WRC
WRVA WSAI WSB WSM WSMB
WSOC WTAG WTAM WTAR WTIC
WTMJ WWJ WWNC

E-10:00 p.m., C-9:00, M-8:00, P-7:00

C — Your True Adventures

KFAB KFH KFPY KLRA KLZ
KMBC KMOX KNX KOIN KOL
KOM A KRLD KRNT KSPD KSL
KTRH K TSA KTUL KVI KWKH
WABC WBBM WBNB WBNS WBT
WCAO WCAU WCCO WDAE WDBJ
WDBO WDRC WEEL WFBL WFBM
WGST WHAS WHCC WHIO WHK
WISN WJAS WJR WJSV WKBW
WKRC WLAC WLZB WMBG WMBR
WOKO WORC WPRO WQAM WREC
WTCC WWL

R — Bob Burns

CFBC CRCT KDYL KFI KFYR
KGW KHQ KOA KOMO KPO KPRC
KSD KSTP KTAR KTBS KTHS
KV00 KY WAVE WBAF WHEN
WCAE WCSH WDAF WDAY WEAF
WEBC WEEI WFBW WFLA WGY
WHO WIBA WIOD WIS WJAR
WJAX WJDX WKY WLW WMAQ
WMC WOAI WOW WPTF WRC
WRVA WSB WSM WSMB WSOC
WTAG WTAM WTAR WTIC WTMJ
WWJ WWNC

E-10:30 p.m., C-9:30, M-8:30, P-7:30

C — March of Time

KFAB KFPY KLZ KMBC KMOX
KNX KOIN KOL KOMA KRNT
KSPD KSL KVI WABC WBBM
WBNS WCAO WCAU WCCO WDRC
WEEI WFBL WFBM WGST WHAS
WHCC WHK WJAS WJR WJSV
WKBW WKRC WOKO WPRO WWL

E-11:00 p.m., C-10:00, M-9:00, P-8:00

C — Poetic Melodies, See Monday

R — Amos 'n' Andy, See Monday

FRIDAY

E-6:35 p.m., C-5:35, M-4:35, P-3:35

C — Baseball Resume, See Monday

E-6:45 p.m., C-5:45, M-4:45, P-3:45

B — Lowell Thomas, See Monday

E-7:00 p.m., C-6:00, M-5:00, P-4:00

C — Poetic Melodies, See Monday

R — Amos 'n' Andy, See Monday

E-7:15 p.m., C-6:15, M-5:15, P-4:15

R — Uncle Ezra, See Monday

E-7:30 p.m., C-6:30, M-5:30, P-4:30

B — Lum and Abner, See Monday

E-7:45 p.m., C-6:45, M-5:45, P-4:45

C — Boake Carter, See Monday

E-8:00 p.m., C-7:00, M-6:00, P-5:00

C — Hammerstein Music Hall

KDB KERN KFAB KFBK KFPY
KFCR KGB KHJ KLZ KMBC KMJ
KMOX KOIN KOL KOMA KRNT

FRIDAY (Continued)

KSL KVI KWG WABC WBBM
WBNS WBRC WBT WCAO WCAU
WCCO WDRC WEAN WFBL WFBM
WFRB WGST WHAS WHK WJAS
WJR WJSV WKRC WMAS WMBG
WNAC WOKO WWL

R — Cities Service Concert

CRCT CPLYR KOA KPRC KSD
KSTP KTBS KTHS KV00 KYW
WBAP WBNB WCAE WCHS WDAF
WDAY WEAF WEBC WEEI WFAA
WFBR WGY WHO WIBA WIOD
WJAR WKY WMAQ WOAI WOW
WRC WRVA WSAI WTAG WTAM
WTIC WTMJ WWJ

E-8:30 p.m., C-7:30, M-6:30, P-5:30

C — Hal Kemp

KFAB KFH KGKO KLRA KMBC
KMOX KOMA KRLL KRNT KSCJ
KTRH KTSa KTUL KWKH WABC
WACO WADC WALA WBBM WBIG
WBNS WBRC WBT WCAO WCAU
WCCO WCOA WDAE WDBJ WDBO
WDNC WDOD WDRC WEEI WFBL
WFBM WFEA WGR WGST WHAS
WHBC WHK WHP WIBW WIBX
WISN WJAS WJR WJSV
WKBN WKRC WLAC WLWB WMAS
WMBD WMBG WMBR WMNN
WNAX WNBW WNOX WOC WOKO
WORC WOWO WPG WPRO WQAM
WREC WSPA WSJS WSPD WTOC
WWL

B — Death Valley Days

KDKA KDYL KFI KGW KHQ KOIL
KOMO KPO KSO KWK WBAL WBSZ
WBZA WFIL WGAR WHAM WJZ
WLS WLW WMAL WMT WREN
WSYR WXYZ

E-9:00 p.m., C-8:00, M-7:00, P-6:00

C — Hollywood Hotel

CFRB CKAC KDB KERN KFAB
KFBB KFH KFPY KFRC KGB
KHJ KLRA KLZ KMBC KMJ KMOX
KOH KOIN KOL KOMA KRLL KRNT
KSCJ KSL KTRH KTSa KTUL KVI
KVOR KVG KWKH WABC WADC
WBBM WBNB WBRC WBT WCAO
WCAU WCCO WDAE WDBJ WDBO
WDRC WEAN WFBL WFBM WFEA
WGST WHAS WHEC WHK WHP
WIBW WIBX WICC WJAS WJR
WJSV WKBN WKRC WLAC WLWB
WMAS WMBD WMBG WMBR
WNAC WNAX WNOX WOKO WORC
WPG WQAM WREC WSPD WWL

R — Frank Munn; Bernice Claire

KSD KYW WBNB WCAE WCHS
WDAF WEAF WEEI WFBR WGY
WJAR WLW WMAQ WOW WRC
WTAG WTAM WWJ

B — "Believe It or Not" Ripley

KANS KDKA KFYR KGNC KLO
KOIL KPRC KSO KYOD KWK WAPT
WAVE WBAL WBAP WBZ WBZA
WDAY WEAN WEBC WEHR WFAA
WFOC WFIL WGAR WHAM WIBA
WICZ WJZ WKY WLS WLW WMAL
WMC WMT WOAI WOOD WPTF
WREN WRTD WSB WSM WSMB
WSOC WSPD WSYR WTAR WTCN
WTMJ WXYZ

E-9:30 p.m., C-8:30, M-7:30, P-6:30

R — True Story Court

KSD KYW WBNB WCAE WCHS
WEAF WEEI WFBR WGY WHO
WHIO WJAR WMAQ WOW WRC
WTAG WTAM WTIC WWJ

E-10:00 p.m., C-9:00, M-8:00, P-7:00

R — First Nighter; Drama

KDYL KFI KFYR KGW KHQ KOA
KOMO KPO KPRC KSD KSTP
KTBS KTHS KYW WAVE WBNB
WCAE WCHS WDAF WDAY WEAF
WEBC WEEI WFAA WFBR WFLA
WGY WHO WIBA WIOD WIS WJAR
WJAX WJDX WKY WLW WMAQ
WMC WPTF WRC WRVA WSB
WSM WSMB WSOC WTAG WTAM
WTAR WTIC WTMJ WWJ WWNC

B — Morton Bowe

KDKA KECA KFSD KGA KGO
KJR KLO KOIL KSO KWK WABY
WBAL WBZ WBZA WCKY WCOL
WEAN WEHR WENR WFIL WFLA
WGAR WHAM WICC WIOD WIS
WJAX WJZ WMAL WMT WOOD
WPTF WREN WRVA WSOC WSUN
WSYR WTAR WWNC WXYZ

E-10:30 p.m., C-9:30, M-8:30, P-7:30

R — Jimmy Fidler

KDYL KFI KGW KHQ KOA KOMO
KPO KSD KSTP KYW WBNB
WCAE WCHS WDAF WDEL WFAE
WFBR WGY WIBA WIRE WJAR
WLW WMAQ WNAC WOW WRC
WTAG WTAM WTIC WTMJ WWJ

E-11:00 p.m., C-10:00, M-9:00, P-8:00

R — Amos 'n' Andy, See Monday

E-11:15 p.m., C-10:15, M-9:15, P-8:15

C — Boake Carter, See Monday

E-11:30 p.m., C-10:30, M-9:30, P-8:30

C — Hal Kemp

KFBB KFPY KGMB KGVO KLZ
KNX KOH KOIN KOL KSFO KSL
KVI KVOR

SATURDAY

E-6:35 p.m., C-5:35, M-4:35, P-3:35

C — Baseball Resume, See Monday

E-8:00 p.m., C-7:00, M-6:00, P-5:00

C — Saturday Swing Club

KFBB KFH KFPY KGKO KGVO
KLZ KNOW KOH KOL KOMA KRLL
KSCJ KSFO KSL KTRH KTSa KVI
KVOR KWKH WABC WACO WADC
WBIG WBNS WBT WCAO WCAU
WCCO WDAE WDBO WDRC WEEI
WFBL WGR WHEC WHK WHP
WIBW WIBX WISN WJAS WLW
WMAS WMBD WMBG WNBW WOC
WOKO WORC WPRO WSJS WVVVA

E-8:30 p.m., C-7:30, M-6:30, P-5:30

C — Phil Duesy; Russ Morgan

KFAB KFH KMBC KMOX KRNT
WABC WADC WBBM WBIC WBNS
WBT WCAO WCAU WCCO WCOA
WDRC WEEI WFBL WFBM WGR
WGST WHAS WHEC WHIO WHK
WHP WISN WJAS WJR WJSV

WKRC WMBD WMBG WNBW WOC
WOKO WPRO WSBT WVVVA

E-9:00 p.m., C-8:00, M-7:00, P-6:00

C — Prof. Quiz

KDB KERN KFAB KFBK KFPY
KFRC KGB KHJ KLRA KLZ KMBC
KMJ KMOX KOIN KOL KOMA
KRLL KRNT KSL KTRH KTSa
KVI KWG WABC WBBM WBNS
WBT WCAO WCAU WCCO WDAE
WDBO WDRC WEAN WFBL WFBM
WJAS WJR WJSV WKBW WRCB
WMBR WOKO WQAM WREC WSPD
WWL

B — National Barn Dance

KDKA KOIL KPRC KSO KTBS
KTHS KWK WABY WAPI WAVE
WBAL WBAP WBZ WBZA WFIL
WFLA WGAR WHAM WIOD WIRE
WIS WJAX WJDX WJZ WKY WLS
WMAL WMC WMT WOAI WOOD
WPTF WREN WRVA WSB WSMB
WSOC WSUN WSYR WTAR WWNC
WXYZ

E-10:00 p.m., C-9:00, M-8:00, P-7:00

C — Your Hit Parade

KERN KFAA KFBK KFH KFPY
KFRC KGB KGKO KGMB KHJ
KLRA KLZ KMBC KMJ KMOX
KOH KOIN KOL KOMA KRLL
KRNT KSCJ KSL KTRH KTSa
KTUL KVI KVOR KWKH KWKH
WABC WACO WADC WALA WBBM
WBIG WBNS WBRC WBT WCAO
WCAU WCCO WCOA WDAE WDBJ
WDBO WDNC WDOD WDRB WEAN
WFBL WFBM WFEA WGST WHAS
WHBC WHK WHP WIBW WIBX
WICC WISN WJAS WJR WJSV
WKBN WKRC WLAC WLWB WMAS
WMBD WMBG WMBR WNAC
WNAX WNOX WOC WOKO WORC
WPG WQAM WREC WSBT WSPA
WSJS WSPD WTOC WWL WVVVA

E-11:00 p.m., C-10:00, M-9:00, P-8:00

CBC — The Northern Messenger

CFAC CFCH CFCO CFJC CFPL
CFQC CHWK CJAT CJA CJCX
CJKL CJOC CJRM CJRO CJRX
CKBI CKCK CKGB CKOC CKOV
CKRP CKOO CKTB CKX CKY
CROK CHCM CROO CRCS CROZ
CROV CROW CROX

B — National Barn Dance

KDYL KFI KFSD KFYR KGHL
KGRH KGU KGW KHQ KOA KOMO
KPO KSTP KTAH WDAY WEBC
WIBA WLW WTMJ

SUNDAY

E-11:30 a.m., C-10:30, M-9:30, P-8:30

C — Major Bowes' "Family"

CFRB KERN KFAB KFBK KFBK
KFH KFPY KFRC KGB KGVO
KMBC KOH KOL KRLL KSL KTRH
KTSa KVI KVOR KVG KWKH
WABC WACO WADC WALA WBNS
WBIC WCAO WCCO WDAE WDBJ
WDBO WDNC WESG WFBL WFEA
WHAS WHK WIBX WJAS WJR
WKRC WLWB WMBD WMBR
WMNN WOC WOKO WORC WPG
WQAM WSBT WSJS WSPD WTOC

SUNDAY (Continued)

E-12:30 p.m., C-11:30 a.m., M-10:30, P-9:30

C — Salt Lake Tabernacle Choir
CFRB KFAB KFBB KFBB KFH KFK KFY KFR KGB KLZ KOH KOH KRLD KSL KTRH KTSa KVI KVOR KWG WABC WACO WADC WALA WBG WBNS WBRC WCAO WCCO WDAE WDBJ WDBO WESG WFBL WFEA WFR WHAS WICC WJAS WJR WKRC WLBC WMBR WMNM WOC WOKO WORC WQAM WSBT WSPD WTPC WTOC

E-1:00 p.m., C-Noon, M-11:00 a.m., P-10:00

C — Church of the Air
KFBB KFH KFY KFR KGB KKH KMOX KOH KOH KOMA KRLD KRNT KSCJ KSL KTRH KTSa KVI KVOR KWG WABC WALA WBNS WDBO WCAO WCO WDAE WDBJ WDR WDR WESG WFBL WFBM WFR WHAS WHP WIBX WJAS WJSV WKBN WKRC WLAC WLBC WMBR WNBW WOC WOKO WORC WPG WQAM WREC WSBT WSJS WSPD WTOC WTV

E-2:00 p.m., C-1:00, M-Noon, P-11:00 a.m.

B — Magic Key of RCA
CFRC CRCT KDKA KDYL KFI KFYR KGU KGW KHQ KOA KOIL KOMO KPO KPRC KSO KSTP KTBS KTHS KV00 KWK WAPI WAVE WBAL WBZ WBZA WCKY WDAY WECB WENR WFAA WFIL WFLA WGAR WHAM WHIO WIBA WIOD WIRE WIS WJAX WJDX WJZ WKY WMAL WMC WMT WOAI WPTF WREN WRVA WSB WSM WSMB WSOB WSYR WTAR WTMJ WWNC WXYZ

E-2:30 p.m., C-1:30, M-12:30 p.m., P-11:30 a.m.

R — Thatcher Colt Mystery
KDYL KFI KGW KHQ KOA KOMO KPO KSD KSTP KYW WBAF WBOW WCAE WCSH WDAF WEAJ WFBR WGBF WGY WHO WIRE WJAR WMAQ WNAW WOC WOKO WRC WSAI WTAG WTAM WTV WTV WTV

E-3:00 p.m., C-2:00, M-1:00, P-Noon

C — Everybody's Music
CFRB CKAC KFAB KFBB KFH KFK KGO KGV KLRA KLZ KMBC KMOX KNOW KOL KRLD KSCJ KSL KTRH KTSa KWK WABC WADC WDAE WDBJ WDBO WDR WDR WESG WFBL WFBM WHAS WHK WHP WIBX WJAS WJR WJSV WKBW WKBN WKWB WKRC WLAC WLBZ WMAS WMBD WMBG WMBR WMNM WNBW WOC WOKO WORC WPAR WPRO WQAM WSBT WSJS WTAQ WTOC WWL

E-5:30 p.m., C-4:30, M-3:30, P-2:30

C — Guy Lombardo and Orchestra
KFH KMBC KMOX KOMA KTUL WAAB WABC WBNS WCAO WCAU

WDR WDR WFBM WGR WHAS WHEC WHK WIBX WICC WJR WJSV WMAW WOKO WORC WSPD WWVA

B — Smiling Ed McConnell
Station List not available.

E-6:00 p.m., C-5:00, M-4:00, P-3:00

M — Ray Knight; Arnold Johnson
CKLW KHJ KWK WAAB WBAJ WFIL WGAR WGN WLW WOR

E-6:30 p.m., C-5:30, M-4:30, P-3:30

R — A Tale of Today
WBN WEAJ WGY WJAR WMAQ WOV WRC WTAM

E-7:00 p.m., C-6:00, M-5:00, P-4:00

C — Columbia Workshop
KFAB KFBB KFH KFY KGO KGOV KNOW KOH KOIN KOL KOMA KRLD KRNT KSCJ KSF0 KTRH KTSa KTUL KVI KVOR KWKH WABC WACO WADC WALA WBBM WBNS WBRC WBT WCAO WCOO WCOA WDAE WDBO WDR WFBM WFBM WGR WGST WHEC WHIO WHK WHP WIBX WISN WJAS WJNO WKRC WLBZ WMAS WMBG WMNM WNOX WNOY WORC WPG WREC WSBT WSJS WSPD WTOC

R — Jello Program
KSD KYA KYW WBN WCAE WCBH WDAF WEAJ WFBR WGY WHO WJAR WLW WMAQ WNAW WOV WRC WTAG WTAM WTV WWJ

E-7:30 p.m., C-6:30, M-5:30, P-4:30

C — Oscar Bradley Orchestra
KLRA KLZ KRLD KTRH KTSa KTUL KWKH WABC WACO WADC WALA WBG WBNS WBRC WBT WCAO WCAU WCOA WDAE WDBJ WDBO WDR WDR WDR WFBM WFEA WGR WGST WHAS WHEC WHK WHP WIBX WICC WJAS WJR WJSV WKBN WKRC WLAC WLBZ WMAS WMBR WNAW WNOX WOKO WORC WQAM WREC WSBT WSFA WSJS WSMK WSPD WTOC WWL WWVA

R — Fireside Recitals
KSD KYW WBN WCAE WCBH WDAF WEAJ WFBR WGY WIRE WJAR WMAQ WOV WRC WSAI WTAG WTAM WTV WWJ

E-7:45 p.m., C-6:45, M-5:45, P-4:45

R — Sunset Dreams; Morin Sisters
CFRC CRCT KSD KYW WBN WCAE WCBH WDAF WEAJ WFBR WGY WHO WIRE WJAR WLW WMAQ WOAI WOOD WOV WRC WTAG WTAM WTV WWJ

E-8:00 p.m., C-7:00, M-6:00, P-5:00

C — Gillette Program
KFAB KFH KFY KLRA KLZ KMBC KMOX KNX KOIN KOL KOMA KRLD KRNT KSCJ KSF0 KSL KTRH KTSa KTUL KVI KWKH WABC WADC WBBM WBG WBNS WBT WCAO WCAU WCOO WDAE WDBJ WDBO WDR WEEI WFBM WGR WGST WHAS WHEC WHIO WHK WHP WIBX WJAS WJR WJSV WKBN WKRC WLAC WLBZ WMAS WMBG

WMBR WNAW WNBW WNOX WOKO WORC WPRO WQAM WREC WSBT WWL WWVA

R — Don Ameche; Edgar Bergen

CFRC CRCT KDYL KFI KFYR KGW KHQ KOA KOMO KPO KPRC KSD KSTP KTAR KTBS KV00 KYW WAVE WBN WCAE WCBH WDAF WDAY WEAJ WECB WFAA WFBR WFLA WGY WHO WIBA WIOD WIRE WIS WJAR WJAX WJDX WKY WLW WMAQ WMC WNAW WOAI WOV WPTF WRC WRVA WSB WSM WSMB WSOB WSON WTAG WTAM WTV WTV WTMJ WTV WWNC

E-9:00 p.m., C-8:00, M-7:00, P-6:00

B — Bob Hope; Shep Fields
KDKA KECA KFSD KGA KGHIL KGIR KGO KJR KLO KOIL KSO KTAR KWK WBAJ WBZ WBZA WHEC WENR WENR WFIL WGAR WHAM WICC WJZ WLW WMAL WMT WREN WSYR WXYZ

R — Manhattan Merry-Go-Round

CFRC KDYL KFI KFYR KGW KHQ KOA KOMO KPO KPRC KSD KSTP KTBS KTHS KYW WAVE WBN WCAE WCKY WCBH WDAF WDAY WEAJ WECB WEEI WFAA WFBR WFLA WGY WHO WIBA WIOD WIRE WIS WJAR WJAX WJDX WKY WMAQ WMC WOAI WOV WPTF WRC WRVA WSB WSM WSMB WSOB WTAG WTAM WTV WTV WTMJ WWJ WWNC

C — Ford Universal Rhythm

CFRB CKAC KDB KERN KFAB KFK KFH KFY KFR KGB KGO KKH KLRA KLZ KMBC KMI KMOX KOH KOIN KOL KOMA KRLD KRNT KSCJ KSL KTRH KTSa KTUL KVI KVOR KWG KWKH WABC WACO WADC WALA WBBM WBG WBNS WBRC WBT WCAO WCAU WCOO WCOA WDAE WDBJ WDBO WDR WDR WDR WFBM WFBM WFEA WGR WGST WGST WHAS WHEC WHK WHP WIBX WJBW WIBX WICC WISN WJAS WJR WJSV WKBN WKRC WLAC WLBZ WMAS WMBD WMBR WNAW WNOX WOKO WORC WQAM WREC WSBT WSFA WSJS WSPD WTOC WWL WWVA

E-9:30 p.m., C-8:30, M-7:30, P-6:30

R — Album of Familiar Music
CFRC CRCT KDYL KFI KFYR KGW KHQ KOA KOMO KPO KPRC KSD KSTP KTBS KYW WAPI WAVE WBN WCAE WCBH WDAF WDAY WEAJ WECB WEEI WFAA WFBR WFLA WGY WHO WIBA WIOD WIS WJAR WJAX WJDX WKY WMAQ WMC WOAI WOV WPTF WRC WRVA WSAI WSB WSM WSMB WSOB WTAG WTAM WTV WTV WTMJ WWJ WWNC

B — Walter Winchell

KDKA KECA KEX KFSD KGA KGHIL KGIR KGO KJR KLO KOIL KSO KTAR KWK WBAJ WBZ WBZA WENR WFIL WGAR WHAM WJZ WLW WMAL WMT WREN WSYR WXYZ

SUNDAY (Continued)

E-10:00 p.m., C-9:00, M-8:00, P-7:00

R — James Melton

KDYL KFI KGBX KGW KHQ KOA
KPO KPRC KSD KSTP KTAR KTBS
KTHS KYW WAVE WBAP WBNB
WCAE WCHS WDAF WFAF WFBR
WFLA WGY WHO WIBA WIOD
WIRE WIS WJAR WJAX WJDX
WKY WMAQ WMC WNAC WOAI

WOOD WOW WPTF WRC WRVA
WSB WSM WSMB WSOC WTAG
WTAM WTAR WTIC WTMJ WWJ
WWNC

E-11:00 p.m., C-10:00, M-9:00, P-8:00

R — Sunset Dreams; Morin Sisters

KDYL KFI KFSO KGW KHQ KOA
KOMO KPO KPRC KTAR KTBS
KTHS WBAP WDAF WKY

E-11:15 p.m., C-10:15, M-9:15, P-8:15

B — Walter Winchell

KDYL KFI KFSO KGHL KGIR
KGW KHQ KOA KOMO KPO KPRC
KTAR KTBS KTHS WAPI WAVE
WBAP WJDX WKY WMC WOAI
WSB WSM WSMB

E-11:30 p.m., C-10:30, M-9:30, P-8:30

B — Bob Hope; Shep Fields

KPRC KTBS KTHS KVOD WAPI
WAVE WBAP WJDX WKY WMC
WOAI WSB WSM WSMB

About Aerials

(Continued from Page 19)

leadin and the other between the leadin and the receiver. The former is the *antenna-matching transformer*, and the latter is the *set-matching transformer*. In most cases, with commercial kits, the antenna and the leadin lines are designed so as to match without the need of a transformer supported in the air. It is because of this necessity of matching the aerial sections that most antenna manufacturers warn the user not to cut the transmission lines. Since all receivers are different, however, a set-matching transformer is always necessary.

When a radio set maker also provides his own type antenna kit for use with his radios, he frequently matches the transmission line to the pre-selector circuit of the receiver, so that in this case a set matching transformer is not required.

To properly construct matching transformers for the home-made doublet or noise-reducing antenna is a difficult task. Such a transformer, in effect, might consist of a short tube of cardboard about ½ inch in diameter wound with several layers of fine wire—about No. 32; 500 turns should be sufficient. Over this wrap

a piece of waxed paper, and then a layer of tin foil, but leave a small gap between its ends so as to expose a portion of the turns of wire on the secondary coil beneath. Cover this with more waxed paper, and wrap on the primary which is about 100 turns of the same wire. Connect the primary to the antennna transmission line and the secondary to the antenna and ground terminals of the set. The tin foil shield keeps out some noise. This transformer is best adapted to older sets made for the broadcast band.

“I have had most excellent results during the past winter and through this hot summer, despite the fact most DXers have disliked reception conditions this year,” declares Howard M. Philips, 3907—20th St., Washington, D. C. “I have found that dark days and heavily clouded skies when not accompanied by lightning, low temperature and high humidity, spell the best DX. The broadcast band has been so good that WKAQ is heard R7—9, QSA3—5 very regularly in the evenings.”

CLASSIFIED INDEX TO CHAIN PROGRAMS

Time in Eastern Standard

C—Columbia; R—National (Red); B—National (Blue); M—Mutual

CONCERTS

Everybody's Music, 3 p.m. Sun., C
 Frank Black, 2 p.m. Sun., B
 Rosario Bourdon, 8 p.m. Fri., R
 G. M. "Prom" Concert, 8 p.m. Sun., B
 Radio City Music Hall, 12:30 p.m. Sun., B
 Don Voorhees, 8 p.m. Wed., C

DANCE BANDS

Ben Bernie, 9 p.m. Tues., B
 Bunny Berigan, 8 p.m. Sat., C
 Oscar Bradley, 7:30 p.m. Sun., C
 Rex Chandler, 9 p.m. Sun., C
 Jimmie Dorsey, 10 p.m. Thurs., R
 Tommy Dorsey, 10 p.m. Fri., B
 Shep Fields, 9 and 11:30 p.m. Sun., B
 Lud Gluskin, 8:30 Wed., C
 Al Goodman, 9 and 11:15 p.m. Thurs., R
 Benny Goodman, 9:30 p.m. Tues., C
 Johnny Green, 9:30 p.m. Tues., R
 Phil Harris, 7 and 11:30 p.m. Sun., R
 Horace Heidt, 8 p.m. Mon., C
 Arnold Johnson, 6 p.m. Sun., M
 Hal Kemp, 8:30 and 11:30 p.m. Fri., C
 Wayne King, 8:30 p.m. Tues. and Wed., R; 10 p.m. Mon., C

Andre Kostelanetz, 9 p.m. Wed., C
 Guy Lombardo, 5:30 p.m. Sun., C; 8:30 Thurs., M
 Abe Lyman, 8:30 p.m. Mon., B; 9 p.m. Fri., R; 10 p.m. Wed., R
 Russ Morgan, 8:30 and 11:30 p.m. Sat., C; 8 p.m. Tues., R
 Ray Noble, 8 p.m. Mon., R
 Raymond Paige, 9 p.m. Fri., C
 Jacques Renard, 8:30 and 11 p.m. Sun., C
 Andy Sanelia, 9 p.m. Sun., R
 Phil Spitalny, 9:30 Mon., R
 Rudy Vallee, 8 p.m. Thurs., R
 Peter Van Steeden, 9 p.m. Wed., R
 Don Voorhees, 5:30 p.m. Sun., B

DIALOG

Amos 'n' Andy, 7 and 11 p.m. daily, except Sat. and Sun., R
 Bob Burns, 10 p.m. Thurs., R
 Burns and Allen, 8 p.m. Mon., R
 Easy Aces, 7 p.m. Tues., Wed., Thurs., B
 Eddie Cantor, Wed. at 8:30, C
 Ray Knight, 6 p.m. Sun., M
 Beatrice Lillie, 8 p.m. Wed., B
 Lum and Abner, 7:30 p.m. daily except Sat. and Sun., B
 Ken Murray, 8:30 Wed., C
 Pick and Pat, 8:30 and 11:30 p.m. Mon., C
 Uncle Ezra's Radio Station, 7:15 p.m. Mon., Wed., Fri., R

DRAMA

Columbia Workshop, 7 p.m. Sun., C
 Death Valley Days, 8:30 p.m. Fri., B
 First Nighter, 10 p.m. Fri., R
 Gang Busters, 10 p.m. Wed., C
 Hollywood Hotel, 9 p.m. Fri., C
 It Can Be Done, 8:30 Tues., B
 Phillips Lord, 10 p.m. Wed., C
 One Man's Family, 8 p.m. Wed., R
 Irene Rich, 8 p.m. Fri., B
 Tale of Today, 6:30 p.m. Sun., R

POPULAR PROGRAMS

Album of Familiar Music, 9:30 p.m. Sun., R
 Major Bowes, 11:30 a.m. Sun. and 9 p.m. Thurs., C
 Broadway Merry-Go-Round, 8 p.m. Wed., B
 Cavalcade of America, 8 p.m. Wed., C

Chesterfield Program, 9 p.m. Wed., C
 Cities Service Concert, 8 p.m. Fri., R
 Contented Program, 10 p.m. Mon., R
 Fireside Recitals, 7:30 p.m. Sun., R
 Fleischmann Variety Hour, 8 p.m. Thurs., R
 Hit Parade, 10 p.m. Wed., R; 10 p.m. Sat., C
 Hollywood Hotel, 9 p.m. Fri., C
 Husbands and Wives, 8 p.m. Tues., B
 Magic Key of RCA, 2 p.m. Sun., B
 Manhattan Merry-Go-Round, 9 p.m. Sun., R
 March of Time, 10:30 p.m. Thurs., C
 Maxwell House Show Boat, 9 p.m. Thurs., R
 National Barn Dance, 9 and 11:30 p.m. Sat., B
 Packard Hour, 9:30 p.m. Tues., R
 Palmolive Hour, 9:30 p.m. Wed., C
 Paramount on Parade, 12 noon Sun., R
 Al Pearce and His Gang, 9 p.m. Tues., C
 Professor Quiz, 9 p.m. Sat., C
 Studebaker Champions, 10 p.m. Mon., B
 True Adventures, 10 p.m. Thurs., C
 Voice of Firestone, 8:30 p.m. Mon., R
 Vox Pop, 9 p.m. Tues., R
 Waltz Time, 9 p.m. Fri., R
 Watch The Fun Go By, 9 p.m. Tues., C
 We, The People, 7:30 p.m. Thurs., C

SINGERS

Kenny Baker, 7 and 11:30 p.m. Sun., R
 Richard Bonelli, 7:30 and 10:45 p.m. Sat., C
 Morton Bowe, 10 p.m. Fri., B
 Bobby Breen, 8:30 and 11 p.m. Sun., C
 Rachel Caralay, 9 p.m. Sun., R
 Jessica Dragonette, 8 p.m. Fri., R; 9:30 p.m. Wed., C
 Phil Ducey, 8 and 11:30 p.m. Tues., R; 8:30 Sat., C
 Deanna Durbin, 8:30 p.m. Wed., C
 Mary Eastman, 9:30 p.m. Sat., C
 Nelson Eddy, 8 p.m. Sun., R
 Jack Fulton, 7 and 11 p.m. Mon. thru Thurs., C
 Helen Jepson, 9 and 11:15 p.m. Thurs., R
 Jones and Hare, 10 p.m. Sun., C
 Frances Langford, 9 p.m. Fri., C
 Shirley Lloyd, 7:30 p.m. Sun., B
 Lullaby Lady, 10 p.m. Mon., R
 Elizabeth Lennox, 8 p.m. Fri., C
 Nick Lucas, 9 p.m. Tues., C
 Lucille Manners, 8 p.m. Fri., R
 Helen Marshall, 7:30 p.m., Sun., R
 Ed McConnell, 5:30 p.m. Sun., B
 Luey Monroe, 9:30 p.m. Sun., R
 Morin Sisters, 7:45 and 11 p.m. Sun., R
 Frank Munn, 9:30 p.m. Sun. and 9 p.m. Fri., R; 8:30 p.m. Mon., B
 Dorothy Page, 10:30 p.m. Sat., R
 Frank Parker, 9 and 11:30 p.m. Sun., B
 Jan Peerce, 6:30 p.m. Sun., C
 Carmella Ponselle, 8 p.m. Fri., C
 Virginia Rea, 6:30 p.m. Sun., C
 Lanny Ross, 9 p.m. Thurs., R
 Shirley Ross, 8:30 p.m. Wed., C
 Margaret Speaks, 8:30 and 11:30 p.m. Mon., R
 Gladys Swarthout, 10 p.m. Sun., R
 Conrad Thibault, 9:30 p.m. Tues., R
 Kay Thompson, 8:30 and 11:30 p.m. Fri., C
 Trudy Woods, 9:30 p.m. Tues., R

TALKS

Boake Carter, 7:45 and 11:15 Mon., Wed., Fri., C
 Jimmy Fidler, 10:30 p.m. Tues. and Fri., R
 Floyd Gibbons, 10 p.m. Thurs., C
 Eddie Guest, 8:30 p.m. Tues., B
 Bob Ripley, 7:30 p.m. Sun., B
 Sidewalk Interviews, 9 p.m. Tues., R
 Lowell Thomas, 6:45 p.m. Mon. thru Fri., B
 Walter Winchell, 9:30 and 11:15 p.m. Sun., B

Roster of DX Clubs

FOLLOWING is a list of radio clubs for both broadcast band and shortwave fans.

All-wave All-World DX Club, 214 George St., Sydney, NSW, Australia. Life membership, 3/6 (about 84c).

Before Breakfast DX Club, 309 S. Bedford Drive, Beverly Hills, Calif. Stanley La Rue, President.

Canadian DX Relay, 2104 Lorne ave, Saskatoon, Sask., Canada. C. Hesterman, President. \$1.00 per year.

Chicago Short Wave Radio Club, P. O. Box 240, Chicago, Ill. Harold Wright, President. \$1.00 per year.

Globe Circlers' DX Club, 1652 Radcliff Ave., Bronx, N. Y. Raphael Geller, Pres.

Globe Radio DXers' Association, 61 Lipson St., Pt. Adelaide, SA, Australia. Arthur H. Preece, Secy. \$1 for Life Membership.

International DXers' Alliance, Bloomington, Ill. Charles P. Morrison, Pres. \$1.00 per year domestic, \$1.25 per year foreign.

International Short Wave Club, E. Liverpool, Ohio. Arthur J. Green, Pres. \$1.00 per year.

KDKA DX Club, Station KDKA, Grant Bldg., Pittsburgh, Pa. No. dues.

Liga Colombiana Radio DXers' Alliance, c/o Aurelio Linero, Aptdo. 330, Bogota, Colombia.

National Radio Club, 603 W. Market St., York, Pa. Robt. M. Weaver, Pres. \$1.25 per year.

Newark News Radio Club, 215 Market St., Newark, N. J. Irving H. Potts, Pres. \$2.00 per year.

New Zealand DX Club, Box 1680, Wellington, New Zealand. Fees about 60c per year.

New Zealand DX Radio Association, P. O. Box 437, Dunedin, New

Zealand. Entrance fee of 60c and yearly dues about \$1.56.

Phoenix Shortwave Listeners' Club, 1025 N. 9th St., Phoenix, Ariz. John Binder, Pres. \$1.00 per year.

Quixote Radio Club, Box 772, Santa Barbara, Calif. E. J. Shields, "Chots." Active members \$1.00 for twenty weeks; inactive members, \$1.00 for ten weeks.

Radio Club de Cuba, Lealtad 136, Havana, Cuba.

Radio Club Venezolano, Torre a Madrices No. 8 (altos), Caracas, Venezuela.

R9 Listeners' League, 7417-87th Ave., Woodhaven, N. Y. Alfred G. King, Pres.

Universal DX Club, 345 Maple Ave., Oradell, N. J. Alfred J. Stansfield, Pres. \$1.00 per year.

Universal Radio DX Club, 2018 Green St., San Francisco, Calif. Charles C. Norton, Pres. \$1.00 per year.

Any radio clubs which have been overlooked in this list will be included in our next listing if their secretaries will write us, giving full particulars about their organizations.

Al Jolson is back on the CBS with an enlarged musical variety program. It is heard every Tuesday night as in the past, from 8:30 to 9 pm EST.

In addition to Martha Raye, Parkyakarkus, and the large orchestra conducted by Victor Young, the program this fall boasts the appearance every other week of a prominent guest star from the entertainment world.

Add to the Radio Club Roster the Jackson Short Wave League, 616 Fourth St., Jackson, Mich.

SHORTWAVE BROADCASTING STATIONS OF THE WORLD

Frequencies are given in megacycles. Power is given in parentheses in kilowatts. Schedules are shown in Eastern Standard Time by the 24-hour clock. All schedules daily unless otherwise noted.

Time Conversion Table on Page 62

<p>1.715 to 2.000 Amateur Stations. 2.500 XEXP Monterrey, N. L. (.03). 3.500 to 4.000 Amateur Stations. 3.040 YDA Tandjong Priok, Java, N.E.I. (10.). 4.273 RV15 Khabarovsk, USSR (Siberia) (20.). 0100-1000. 4.600 HC2ET Guayaquil, Ecuador. Wed., Sat., 2100-2230. 4.795 VE9BK Vancouver, B. C. (.25). 4.810 YDE2 Solo, Java, N.E.I. (.1). 4.850 HJ3ABD Bogota, Colombia. (.05). 1930-2400. 5.415 PMY Bandoeng, Java, N.E.I. (.45). 0530- 1000. 5.500 T15HH San Ramon, Costa Rica. (.2). 2000- 2330. 5.710 TGS Guatemala City, Guat. (.2). Wed., Thurs., Sat., 1800-2100. YV2RA San Cristobal, Venez. 1800-2330. 5.720 RV15 Khabarovsk, USSR (Siberia) (20.). 0100-1000. 5.725 HC1PM Quito, Ecuador. Sat., 2100-2300. 5.758 YNOP Managua, Nicaragua. 2000-2130. 5.780 OAX4D Lima, Peru. (3.5). Mon., Wed., Sat., 2100-2330. 5.800 YV5RC Caracas, Venez. (1). Sun., 0830- 2330. Weekdays 0700-2130. 5.820 TIGPH San Jose, Costa Rica. 1100-1300; 1800-2200. 5.850 YV1RB Maracaibo, Venez. Sun., 1145-1245, Weekdays 0845-0945; 1115-1215; 1645-2145. 5.855 HI1J San Pedro de Macoris, D. R. (.04). 1200-1400; 1830-2100. 5.875 HRN Tegucigalpa, Honduras. (.4). Sun., 2030-2130. Weekdays 2030-2200. 5.880 YV3RB Barquisimeto, Venez. 1800-2200. 5.885 HI9B Santiago, D. R. 1800-2300. 5.905 T1LS San Jose, Costa Rica. 1800-2300. 5.910 HH2S Port-au-Prince, Haiti. 1900-2200. YV4RH Valencia, Venez. 1700-0100. 5.930 PJC1 Willemstad, Curacao, N W.I. (.15). 1835-2035. YV1RL Maracaibo, Venez. (.3). 1700-2230. 5.940 TG2X Guatemala City, Guat. (.2). Sun., 1300-1400; Mon., Thurs., Sat., 1600- 1800; 2200-2400. 5.970 HJ4ABD Medellin, Colombia. 2000-2230. 5.980 HJ2ABD Bucaramanga, Colombia. (.67). 1900-2300. 6.000 OAX5C Ica, Peru. (.1). XEBT Mexico City, D. F. (1.). 1800-2400. 6.005 CFCX Montreal, P. Q. (.075). 0700-2400. HP5K Colon, Panama. 1800-2300. VE9DN Montreal, P. Q. (.6.). 6.010 COCO Havana, Cuba. (.3). Sun. 2000-2200, Weekdays 1030-1300; 1600-2000. OLR2A Prague, Czechoslovakia. (35.). Mon., Wed., Fri., 1600-1630. 6.012 HJ3ABH Bogota, Colombia. (1.2). 1800-2300. 6.015 HI3U Santiago de los Caballeros, D. R. (.025). Mon. 2000-2100. Daily 0730- 0930; 1200-1430; 1700-1930.</p>	<p>6.020 DJC Berlin, Germany. (50.). 1135-1630. XEUW Veracruz, Ver. (.02). 1800-2400. 6.025 HJ1ABJ Santa Marta, Colombia. (.05). 1800-2230. 6.030 HJ4ABP Medellin, Colombia. (2.5). 1800- 2300. HP5B Panama City, Panama. (.1). 1700- 2200. OLR2B Prague, Czecho. (35.). VE92J St. John, N. B. (.05). XEBQ Mazatlan, Sin. (.05). 6.035 CXA2 Montevideo, Uruguay. (.5). 6.040 PRA8 Pernambuco, Brazil. (3.). 1500- 2000. W1XAL Boston, Mass. (10.). Mon., 1800- 2000. W4XB Miami, Fla. (5.). YDA Tandjong Priok, Java, N.E.I. (10.). 6.042 HJ1ABG Barranquilla, Colombia. (.15). 1100-2300. 6.050 GSA Davenport, Gt. Britain. (20.). 6.060 VQ71 O Nairobi, Kenya. 1100-2430. W3XAU Philadelphia, Pa. (10.). 2000-2300. W8XAL Cincinnati, Ohio. (10.). 0500-1900; 2300-0100. 6.062 SBG Motala, Sweden. (.5). 1330-1700. 6.070 CFRX Toronto, Ont. (1.). 1000-2300. HJ3ABF Bogota, Colombia. (.05). 1900-2230. 6.070 YV1RD Maracaibo, Venez. 1900-2400. 6.075 VP3MR Georgetown, Brt. Guiana. 1700- 2100. XEBW Guadalajara, Jal. (.045). 6.080 DJM Berlin, Germany. (50.). HP5F Colon, Panama. OAX4Z Lima, Peru. (.15). 1930-2230. VE9CS Vancouver, B. C. (.01). 1400-2400. W9XAA Chicago, Ill. (20.). 1800-2400. 6.085 HJ5ABD Cali, Colombia. 1900-2200. 6.090 CRCX Toronto, Ont. (1.). 1100-1900. HJ4ABC Ibague, Colombia. 2000-2200. XEUU Guadalajara, Jal. HJ4ABE Medellin, Colombia. (1.). 1800-2230. 6.100 W3XAL Bound Brook, N. J. (35.). 2115-0100. W9XF Chicago, Ill. (10.). 2200-0100. Belgrade, Yugoslavia. (1.). 1200- 1700. 6.108 HJ4ABB Manizales, Colombia. 1800-2400. 6.110 G5L London, Gt. Britain. (20.). 6.115 HJ1ABB Barranquilla, Colombia. (.3). OLR2C Prague, Czecho. (35.). 6.118 XEUZ Mexico City, D. F. (5.). 2300-0300. 6.120 W2XE New York, N. Y. (10.). XEFT Veracruz, Ver. (.012). XEPW Mexico City, D. F. 2100-2400. YDA5 Bandoeng, Java, N.E.I. (1.5). 6.122 HJ3ABX Bogota, Colombia. 1730-2230. OAX4P Huancayo, Peru. (.25). OAX6A Arequipa, Peru. (1.). 6.125 CXA4 Montevideo, Uruguay. (1.). 1600- 2145. 6.128 OAX7A Cuzco, Peru. (.1). 6.130 COCD Havana, Cuba. (.35). 1700-0100. VE9HX Halifax, N. S. (.5). 1700-2300. 6.137 CR7AA Lourenco Marques, Port. East Africa. Sun. 0600-0900, Weekdays 0500-0700.</p>
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SHORTWAVE BROADCASTING STATIONS OF THE WORLD

6.138	HJ4ABD	Medellin, Colombia.	7.100	F08AA	Papeete, Tahiti. (.2). Tues., Fri., 2300-2400.
6.140	WSXK	Pittsburgh, Pa. (40.). 2000-2400.	7.200	YNAM	Managua, Nicaragua. 2000-2400.
6.145	HJ4ABU	Pereira, Colombia. 1800-2200.	7.380	XECR	Mexico City, D. F. (20.). Sun., 1800-2000.
6.150	CB615	Santiago, Chile.			Radio Liberté. 1900-2000.
	CJRO	Winnipeg, Man. (.2). 1800-2400.	7.797	HBP	Geneva, Switz. (20.). Sat., 1730-1830.
	H15N	Ciudad Moca, D. R. (.1). 1900-2000.	8.400	HC2CW	Guayaquil, Ecuador.
	VPB	Colombo, Ceylon. (.3). 0700-1030.	8.650	YNI5R	Managua, Nicaragua.
6.158	YV5RD	Caracas, Venez. 1030-1330; 1530-2200.	8.664	COJK	Camaguey, Cuba. (2.4). 1800-0100.
6.174	XEXA	Mexico City, D. F. 1700-2100.	8.950	HCJB	Quito, Ecuador. (.15). Mon., Wed., Sat., 0200-0400; 1300-1500.
6.190	H11A	Santiago de los Caballeros, D. R. (.05). Weekdays 2000-2200.	9.030	COBZ	Havana, Cuba.
6.200	COKG	Santiago, Cuba. (.05). Daily exc. Sat. 0900-2300.	9.125	HAT4	Budapest, Hungary. (20.). Sun., Wed., 1900-2000. Sat., 1800-1900.
	H18Q	Trujillo, D. R. 1700-1900.	9.330	OAX4J	Lima, Peru. (.2). 1200-1500; 1700-0100.
6.210	YV1RI	Coro, Venez. (.15). 1700-2200.	9.345	HBL	Geneva, Switz. (20.).
6.215	TG2	Guatemala City, Guat.	9.350	HS8PJ	Bangkok, Siam. Mon., 0730-1000.
6.230	OAX4G	Lima, Peru. (.4). 1900-2130.	9.363	COBC	Havana, Cuba.
	YV1RG	Valera, Venez. 1730-1930.	9.415	PJC2	Willemstad, Curacao, N.W.I.
6.235	HC2RL	Guayaquil, Ecuador.		PLV	Bandoeng, Java, N.E.I. (80.). 1000-1100.
	HRD	La Ceiba, Honduras. (.25). 2000-2300.	9.428	COCH	Havana, Cuba. (.15). 0700-0100.
6.243	H1N	Trujillo, D. R. (.75).	9.445	HC2RA	Guayaquil, Ecuador. Sun. 1600-2200. Daily 2100-2200.
6.250	YV5RI	Caracas, Venez.	9.450	HC20DA	Guayaquil, Ecuador. 2100-2200.
6.270	YV5RP	Caracas, Venez. (1.2).		TGWA	Guatemala City, Guat. (.2). Sun. 0000-0600. Daily 2000-2400.
6.280	COHB	Sancti-Spiritus, Cuba. (.15). 2100-2300.			Fort de France, Martinique. 1100-1200; 1700-1800.
	H1G	Trujillo, D. R. (.05).	9.460	XGOX	Nanking, China. (.5).
6.300	YV4RD	Maracay, Venez. 1700-2300.	9.470	PJC1	Willemstad, Curacao, N.W.I. (.15). Sun. 1035-1235.
6.312	ZP14	Villarrica, Paraguay (1.). 1100-1700.	9.480	EAR	Madrid, Spain. (20.). Mon. at 2000; Tues., Fri. at 2100.
6.315	H1Z	Trujillo, D. R. (.4).		XEDQ	Guadalajara, Jal. 1900-0100.
6.330	COCW	Havana, Cuba. 0700-2400.	9.500	EAC	Madrid, Spain.
6.340	H11X	Trujillo, D. R. (.5). Tues., Fri., 2000-2200.		HJ1ABE	Cartagena, Colombia. 1700-1800; 2000-2230.
	OAX1A	Chiclayo, Peru. (.2). 2000-2300. Sat. 2000-2400.		VK3ME	Melbourne, Australia. (.5). Daily exc. Sun. 0400-0700.
6.350	HRP1	San Pedro Sula, Honduras.		XEWW	Mexico City, D. F. (10.). 0800-2400.
6.360	YV1RH	Maracaibo, Venez. 1900-2400.	9.501	PRF5	Rio de Janeiro, Brazil. (60.). 1645-1745.
6.380	YV5RF	Caracas, Venezuela.	9.504	OLR3B	Prague, Czecho. (35.).
6.400	YV5RH	Caracas, Venezuela.	9.505	CXA8	Montevideo, Uruguay.
6.410	T1PG	San Jose, Costa Rica. (1.). 1800-2230.		T1LS	San Jose, Costa Rica.
6.416	YV6RC	Bolivar, Venez.		XEFT	Veracruz, Ver. (.02). 1930-2400.
6.420	H115	Santiago, D. R. (.02). 1800-2300.	9.510	GSB	Daventry, Gt. Britain. (20.). 0100-0320; 1215-1800; 2100-2300.
6.425	OAX4K	Lima, Peru. (.2).		HJU	Buenaventura, Colombia. Mon., Wed., Fri. 2000-2300.
6.450	W3XL	Bound Brook, N. J. (100.). Irreg.	9.520	HJ4ABH	Armenia, Colombia. (1.). 0800-1100; 1800-2200.
	H14V	San Francisco de Macoris, D. R. (.025).		XEME	Merida, Yuc. (.015).
6.479	H18A	Trujillo, D. R.			Radio Liberté. 1900-2000.
6.500	H1L	Trujillo, D. R. (.05).	9.525	ZBW3	Hong Kong. (2.5). Sat. 2100-2400. Sun. 0000-0100; 0300-0930. Other days 0400-1000; 2330-0100.
6.508	YV1RM	Maracaibo, Venez.	9.530	LKJ1	Jefoy, Norway. (1.). 0500-0800.
6.508	Radio Guardia Civil, Tetuan, Sp. Morocco. 1900-2000.			W2XAF	Schenectady, N. Y. (40.). 1600-2400.
6.520	YV4RB	Valencia, Venezuela. 1700-2200.	9.535	JZI	Nazaki, Japan. (50.).
6.534	EDR4	Palma, Majorca, Balearic Isl.	9.536	VPD2	Suva, Fiji. (2.). 0530-0700.
6.540	YNI3G	Managua, Nicaragua.	9.540	DJN	Berlin, Germany. (50.). 0005-0515; 0555-1100; 1650-2245.
6.545	YV6RB	Bolivar, Venez. 2100-2300.	9.550	OLR3A	Prague, Czecho. (35.).
6.550	T1RCC	San Jose, Costa Rica. (.5). Tues., Thurs., Sat. 1700-1800.	9.560	DJA	Berlin, Germany. (50.). 0005-0515; 0555-1100; 1650-2245.
6.555	H14D	Trujillo, D. R. (.025). 1700-2000.		HJ1ABB	Barranquilla, Colombia. (.3).
6.620	Prado	Riobamba, Ecuador. Thurr. 2100-2300.	9.562	OAX4T	Lima, Peru. (10.).
6.630	H1T	Trujillo, D. R. (.2). Weekdays, 1800-2100.	9.565	VUB	Bombay, India. (4.5).
6.690	T1EP	San Jose, Costa Rica. 1600-2300.		YV3RB	Barquisimeto, Venez.
6.700	T1VL	San Jose, Costa Rica.	9.570	W1XK	Boston, Mass. (10.). 0630-2400.
6.730	H13C	La Romana, D. R. 1745-2000.		W8XK	Pittsburgh, Pa. (40.). (Not used).
6.775	H1H	San Pedro de Macoris, D. R. (.15). 1900-2000.			
6.800	H17P	Trujillo, D. R. 1930-2100.			
6.820	XGOX	Nanking, China. (.5). 0530-0900.			
6.850	T1OW	Puerto Limon, Costa Rica. (.4). Sun., 1600-1700. Daily 1200-1300.			
6.990	VK8X1	Port Moresby, Papua.			
7.000 to 7.300		Amateur stations.			
7.024	EA9AH	Tetuan, Sp. Morocco. 1500-1700.			

SHORTWAVE BROADCASTING STATIONS OF THE WORLD

9.575	HJ2ABC	Cucuta, Colombia. (.25).	11.790	W1XAL	Boston, Mass. (10.). Sun. 1530-1800 Other days 1600-1730.
9.580	GSC	Daventry, Gt. Britain. (20.).	11.795	DJO	Berlin, Germany. (8.).
	VK3LR	Melbourne, Australia. (.5). 0100-0945.	11.796	OAX5A	Ica, Peru. (.1). 1200-1600; 1900-2330.
9.585	VK2ME	Sydney, Australia. (20.). Sun. 0000-0200; 0500-0900; 1130-1330.	11.800	COGF	Matanzas, Cuba. (1.). 0700-2400.
9.590	PCJ	Huizen, Netherlands. (20.). Sun. 1400-1500. Mon. 1900-2000. Tues. 1330-1500. Thurs. 1900-2200. Perth, Australia. (.5). Weekdays 0600-0800.		IZJ	Nazaki, Japan. (50.). 1500-1600; 1630-1730; 0800-0900.
	VK6ME	Perth, Australia. (.5). Weekdays 0600-0800.	OER2	Vienna, Austria. (1.5). Weekdays 0900-1800.	
	W3XAU	Philadelphia, Pa. (10.). 1200-2000.	11.805		Copenhagen, Denmark. 1830-2100.
	W8XAL	Cincinnati, Ohio. (10.). (Under construction).	11.810	I2RO	Rome, Italy. (25.). Sun. 0645-1730. Mon., Wed., Fri. 0645-1930. Tues., Thurs., Sat. 0645-1945.
9.595	HBL	Geneva, Switzerland. (18.). Sat. 1730-1830.	11.820	G5N	Daventry, Gt. Britain.
	RAN	Moscow, USSR. 1900-2115.		XEBR	Hermosillo, Son. (.15). 2100-2400.
9.600	CB960	Santiago, Chile. 1800-1930.	11.830	KZRM	Manila, P. I.
	XEYU	Mexico City, D. F. 1900-2200.		W2XE	New York, N. Y. (10.). Daily 1830-1900. Sun. 1900-2400.
9.605	HP5J	Panama City, Panama. (1.). 1830-2300.		W9XAA	Chicago, Ill. (20.).
9.610	YDB	Soerabaja I, Java, N.E.I. (1.).	11.840	CSW	Lisbon, Portugal. (5.).
9.618	HJ1ABP	Cartagena, Colombia. (.75). 1700-2300.		OLR4A	Prague, Czecho. (35.). Mon., Thurs., 1900-2100. Daily 1430-1630.
9.635	I2RO	Rome, Italy. (25.).	11.855	DJP	Berlin, Germany. (50.).
9.645	HH3W	Port-au-Prince, Haiti. (.03). 1300-1400; 1900-2000.	11.860	GSE	Daventry, Gt. Britain. (20.).
9.650	CT1AA	Lisbon, Portugal. (2.). Tues., Thurs., Sat. 1600-1900.		YDB	Soerabaja I, Java, N.E.I. (1.).
9.660	CR6AA	Lobito, Angola, Port. West Africa. (.5). Wed., Sat., 1445-1645.	11.870	W8XK	Pittsburgh, Pa. (40.). 1700-2000.
	LRX	Buenos Aires, Argentina. (5.). 1030-2430.	11.875	OLR4C	Prague, Czecho. (35.).
9.670	TI4NRH	Heredia, Costa Rica. 2100-2200; 2330-2400.	11.880	XEXA	Mexico City, D. F. (1.).
9.750	COCQ	Havana, Cuba. 0700-0100.	11.885	TPA3	Pontoise, France. 0200-0500; 1215-1800.
9.860	EAQ	Madrid, Spain. (20.).	11.895	HP5I	Aguadulce, Panama. 1930-2130.
9.925	JDY	Darien, Manchukuo.	11.900	OLR4D	Prague, Czecho. (35.).
9.940	CSW	Lisbon, Portugal. (5.). 1900-2000.		XEWI	Mexico City, D. F. (.25). 1930-2400.
10.065	CQN	Macau, Portuguese China.	11.955	IUC	Addis Ababa, Ethiopia.
10.070		Communist Station.	11.970	H12X	Trujillo, D. R. (.5). Tues., Fri., 2000-2200.
10.260	PMN	Bandoeng, Java, N.E.I. (1.5). 0530-1100.	12.000	RNE	Moscow, USSR. (20.). Sun. 1000-1100. Sun., Wed., 0600-0700. Sun., Mon., Wed., Fri., 1600-1700.
10.330	ORK	Brussels, Belgium. (11.). 1330-1500.	12.120		Algiers, Algeria.
10.370	EAJ43	Santa Cruz de Tenerife, Canary Isl. Sat. 1700-1800.	12.235	TFJ	Reykjavik, Iceland. (7.5). Sun., 1345-1430.
10.430		Pirate station announcing "Radio Milan."	12.290	GBU	Rugby, Gt. Britain.
10.660	JVN	Nazaki, Japan. (50.).	12.295	CB615	Santiago, Chile.
10.670	CEC	Santiago, Chile. (4.).	12.500	HIN	Trujillo, D. R. (.75).
10.740	JVM	Nazaki, Japan. (50.).	13.635	SPW	Warsaw, Poland. (10.). Mon., Wed., Fri., 1230-1330.
10.823	"Radio Nacional,"	Salamanca, Spain. 1630-1800.	13.986	DJS	Berlin, Germany. (20.).
10.955	HS8PJ	Bangkok, Siam. (5.).	14.000	to 14.400	Amateur Stations.
11.000	PLP	Bandoeng, Java, N.E.I. (1.5).	14.358	HBJ	Geneva, Switz. Sat. 1845-2100.
11.040	CSW	Lisbon, Portugal. (5.). 1500-1900.	14.900	LZA	Sofia, Bulgaria.
11.402	HBO	Geneva, Switz.	15.040	RKI	Moscow, USSR. 1900-2115.
11.450	COXC	Havana, Cuba. Sun. 1800-2100. Other days 0800-2400.	15.110	DJL	Berlin, Germany. (50.). 0000-0200; 0800-0900; 1135-1630. Sun., 0600-0800.
11.698	SBG	Motala, Sweden. (.5). 0100-0130.	15.116	OLR5C	Prague, Czecho. (35.).
11.700	HP5A	Panama City, Pan. 2000-2330.	15.120	HVJ	Vatican City. (10.). 1000-1030.
		Saigon, Fr. Indo-China.	15.140	GSF	Daventry, Gt. Britain. (15.). 1030-1200; 1600-1800; 1820-2030.
11.710	XEWB	Guadalajara, Jal.	15.150	YDC	Bandoeng, Java, N.E.I. (3.).
	YSE	San Salvador, E. S.	15.160	JZK	Nazaki, Japan. (50.). 0030-0130; 0800-0900; 1500-1600; 1630-1730.
11.718	CR78H	Lourenco Marques, Port. East Africa. (.2). Sun. 0530-0700. Other days 0430-0630.		XEWW	Mexico City, D. F. (10.).
11.720	CJRX	Winnipeg, Man. (2.). 1800-2400.	15.170	CXA14	Montevideo, Uruguay.
	TPA4	Pontoise, France. 0615-1300.	15.175	RV96	Moscow, USSR.
11.730	PHI	Villersum, Netherlands. (23.6).	15.180	GSO	Daventry, Gt. Britain. 0100-0320; 1600-1800; 1820-2030.
	XETM	Villahermosa, Tab.	15.200	DJB	Berlin, Germany. (8.). Sun. 1110-1225. Daily 0005-0515; 0555-1100; 1650-2245.
11.740	HP5L	David, Panama. (.35).	15.210	W8XK	Pittsburgh, Pa. (40.). 0700-1700.
11.750	GSD	Daventry, Gt. Britain. (20.). 0100-0320; 1215-1600; 1820-2030; 2100-2300.	15.220	PCJ	Huizen, Netherlands. (20.). Tues. 0430-0600. Wed. 0800-1100.
11.760	OLR4B	Prague, Czecho. (35.).	15.230	OLR5A	Prague, Czecho. (35.). 0930-1130.
11.770	DJD	Berlin, Germany. (50.). 1135-1630; 1650-2245.	15.243	TPA2	Pontoise, France. 0600-1100.
			15.250	W1XAL	Boston, Mass. (10.). 1500-1600.
			15.260	GSI	Daventry, Gt. Britain. 1215-1600; 2100-2300.

15.270	H13X W2XE	Trujillo, D. R. (.5). Sun., 0800-1100. New York, N. Y. (10.). Daily 1500-1800. Sun. 1300-1600; 1700-1800.
15.280	DJQ	Berlin, Germany. (50.). Sun. 1110-1225. Daily 0005-0515; 0600-0800; 0815-1100; 1650-2245.
12.290	LRU	Buenos Aires, Arg. (5.). 0800-1000.
15.300	XEBM	Mazatlan, Sin. 1000-2300.
15.310	GSP	Daventry, Gt. Britain. 1820-2030.
15.320	OLR5B	Prague, Czecho. (35.).
15.330	W2XAD	Schenectady, N. Y. (25.). 1000-2000.
15.340	DJR	Berlin, Germany. (50.). 0800-0900; 1650-2245.
15.370	HAS3	Budapest, Hungary. (20.). Sun. 0900-1000.
15.440	XEBM	Mazatlan, Sin. (.05). 1000-2300.
15.555	C09WX	Tuinicu, Cuba. (2.).
17.310	W3XL	Bound Brook, N. J. (20.).
17.760	DJE	Berlin, Germany. (50.). Sun. 1110-1225. Daily 0005-0515; 0555-1100.
17.770	W2XE PHI	New York, N. Y. (10.). Hilversum, Netherlands. (23.6). Sun., 0725-1025. Mon., Tues., Thurs., Fri., 0825-1000. Sat., 0825-1040.
17.780	W3XAL W8XK W9XAA W9XF	Bound Brook, N. J. (35.). Sun., 0900-1200; 1215-1845; 1900-2100. Weekdays 0900-1845; 1900-2100. Pittsburgh, Pa. (40.). Chicago, Ill. (5.). Chicago, Ill. (10.).
17.790	GSG	Daventry, Gt. Britain. (15.). 0100-0320; 0545-0855; 0915-1200; 1215-1800; 2100-2300.
19.020	H58PJ	Bangkok, Slam.
21.450	OLR6A	Prague, Czecho. (35.).
21.460	W1XAL	Boston, Mass. (10.).
21.470	GSH	Daventry, Gt. Britain. 0545-0855; 0915-1200.
21.480	W2XAD	Schenectady, N. Y. (25.).
21.520	W2XE W3XAU	New York, N. Y. (10.). Daily 0730-1030. Sun. 0800-1000. Philadelphia, Pa.
21.530	G5J	Daventry, Gt. Britain. 0545-0855; 0915-1200.
21.540	W8XK	Pittsburgh, Pa. (40.). 0445-0700.
21.550	GST	Daventry, Gt. Britain.
26.100	GSK	Daventry, Gt. Britain.
28.000 to 30.000		Amateur Stations.

Time Conversion Table

The time given in our indices is Eastern Standard by the 24-hour clock. Our chart this month shows Central Standard Time converted to the EST 24-hour clock, and GMT.

CST	EST 24-hr. clock	GMT
11 p.m.	0000	0600
Midn't	0100	0600
1 a.m.	0200	0700
2 a.m.	0300	0800
3 a.m.	0400	0900
4 a.m.	0500	1000
5 a.m.	0600	1100
6 a.m.	0700	1200
7 a.m.	0800	1300
8 a.m.	0900	1400
9 a.m.	1000	1500
10 a.m.	1100	1600
11 a.m.	1200	1700
Noon	1300	1800
1 p.m.	1400	1900
2 p.m.	1500	2000
3 p.m.	1600	2100
4 p.m.	1700	2200
5 p.m.	1800	2300
6 p.m.	1900	2400
7 p.m.	2000	0100
8 p.m.	2100	0200
9 p.m.	2200	0300
10 p.m.	2300	0400

For times throughout the entire world consult the RADEX Time Converter

W4XCA Memphis, W8XAI Rochester, W8XWJ Detroit, W9XPD St. Louis, a good R8 signal, W1XKA Boston, W8XKA Pittsburgh, W3XKA Philadelphia and W9XHW Minneapolis.

Seven and nine meter police stations have also been heard. On 9 meters W2XEM Newark and W9XEH Evansville, Ind. were picked up, Newark with an R6, QSA 4 rating. Huntington, W. Va., W8XAU, and Ft. Worth, Texas, W5XB, were heard on 7 meters.

When the ultra high frequency band was first opened up to experimental broadcasting it was believed that a large number of stations could operate simultaneously on the same frequency because theoretically these signals could be transmitted no farther than the horizon. It now appears, however, that the UHF band is the coming DX band, and stations sharing the same frequency will be obliged to share time to prevent interference.

U. H. F. in Australia

THE Australasian Radio World for July features an interesting article entitled "Trans-Pacific DX on Ten Meters," in which the author, Alan H. Graham outlines his experiences tuning the American ultra high frequency broadcasting stations. These stations, which claim only local coverage, are received with signals varying from R4 to R8 in Australia.

Among the stations which were heard, are W6XKG in Los Angeles, W9XAZ in Milwaukee, with an R4 signal, W2XDU New York City,

NORTH AMERICAN B. C. STATIONS BY FREQUENCIES

KEY TO SYMBOLS

As shown in the Index by
Frequencies and Dial Numbers

Frequency is given in kilocycles; wave lengths in meters. Night power is shown in watts in third column. Daytime power is shown in parentheses in fourth column in kilowatts, thus (.25) indicating 250 watts. Some stations outside the United States use a "split frequency." Their exact frequency is shown in fourth column.

<p>Second Column Symbols</p> <p>a Verifies reception for return postage.</p> <p>b Verifies only occasionally.</p> <p>c Does not verify.</p> <p>d Verification 10c; letter 25c.</p> <p>h Sends own station stamp for 10c.</p> <p>i Sends own station stamp for 5c.</p> <p>j Sends own station stamp for postage.</p> <p>k Has no stamps.</p> <p>m Verifies for 5c.</p>	<p>n Weather or time only.</p> <p>z No information available.</p> <p>Fourth Column Symbols</p> <p>B National "Blue" network.</p> <p>C Columbia network.</p> <p>D Day time only.</p> <p>Dn Day time with occasional evening hours.</p> <p>F Canadian Brdctg. Corp.</p> <p>M Mutual Brdctg. Sys.</p> <p>N National "Red" and "Blue" networks.</p> <p>P Has construction permit only.</p>	<p>R National "Red" network.</p> <p>S Sunday only.</p> <p>Sy Synchronized.</p> <p>X Has permit to increase power.</p> <p>Y Has permit to change location.</p> <p>Z Has permit to change frequency.</p> <p>a-b-c. Small letters show stations using same transmitter.</p> <p>1-2-3. Figures denote stations sharing time.</p> <p>.... No information.</p>
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540 keys. (555.2)

CJRM ak 1000 F Regina, Sask.

—J. Richardson & Sons, Ltd.

550 keys. (545.1)

CFNB	mk	500	F (1)	Fredericton, N. B.
KFUO	ak	500	2 (1)	St. Louis, Mo.
KFYR	ak	1000	N (5)	Bismarck, N. Dak.
KOAC	ak	1000	....	Corvallis, Ore.
KSD	ak	1000	2R (5)	St. Louis, Mo.
KTSA	ak	1000	C (5)	San Antonio, Tex.
WDEV	ak	500	D	Waterbury, Vt.
WGR	ak	1000	C (5)	Buffalo, N. Y.
WKRC	ak	1000	C (5)	Cincinnati, Ohio
WWSA	ak	500	D	Harrisonburg, Va.
XEFC	ak	100	....	Merida, Yuc.

- James S. Neill & Sons.
- Evangelical Luth. Synod.
- Meyer Brdctg. Co.
- State Agricultural Col.
- St. L. Post-Dispatch.
- KTSA Brdctg. Co.
- Chas. B. Adams, Adm.
- Buffalo Brdctg. Corp.
- Columbia Brdctg. Sys.
- Shenandoah Valley Brdctg. Corp.
- Julio Molina Font.

560 keys. (535.4)

KFDM	ak	500	(1) B	Beaumont, Texas
KLZ	ak	1000	C (5)	Denver, Colo.
KSFO	ak	1000	CXY	San Francisco, Cal.
KWTO	ak	5000	D	Springfield, Mo.
WFIL	ak	1000	BM	Philadelphia, Pa.
WIND	ak	1000	(5)	Gary, Ind.
WIS	ak	1000	N (5)	Columbia, S. C.
WQAM	ak	1000	C	Miami, Fla.

- Sabine Brdctg. Co., Inc.
- KLZ Brdctg. Co.
- Associated Brdcters, Inc.
- Ozarks Brdctg. Co.
- WFIL Brdctg. Co.
- Johnson-Kennedy Radio Corp.
- Station WIS, Inc.
- Miami Brdctg. Co.

570 keys. (526.0)

CMCY	ak	5000	....	Havana, Cuba
CGKO	ak	250	CY (1)	Wichita Falls, Tex.
KMTR	ak	1000	....	Los Angeles, Calif.
KVI	ak	1000	C (5)	Tacoma, Wash.
WKBN	ak	500	C1	Youngstown, Ohio
WMCA	ak	1000	....	New York, N. Y.
WNAX	ak	1000	C (5)	Yankton, S. Dak.
WOSU	ak	750	1 (1)	Columbus, Ohio
WSYR	ak	1000	B (WSYU)	Syracuse, N. Y.
WWNC	ak	1000	N	Asheville, N. C.

- Outran Cia., los Presidentes 215.
- Ft. Worth Star-Telegram.
- KMTR Radio Corp.
- Puget Sound Brdctg. Co.
- WKBN Brdctg. Corp.
- Knickerbocker Brdctg. Co.
- WNAX Brdctg. Co.
- Ohio State University
- Central N. Y. Brdctg. Corp.
- Citizen-Times Co., Inc.

580 keys. (516.9)

CFPR	ak	50	....	Prince Rupert, B. C.
CHRC	ak	100	....	Quebec, P. Q.
CKCL	ak	100	F	Toronto, Ont.
CKUA	ak	500	....	Edmonton, Alta.
KMJ	ak	1000	N	Fresno, Calif.
KSAC	ak	500	2 (1)	Manhattan, Kans.
WGHS	ak	500	C (1)	Charleston, W. Va.
WDBO	ak	1000	C	Orlando, Fla.
WIBW	ak	1000	2C (5)	Topeka, Kans.

- Felix E. Batt.
- CIIRC, Ltd.
- Dominion Battery Co., Ltd.
- University of Alta.
- McClatchey Brdctg. Co.
- State College of Agriculture.
- Charleston Brdctg. Co.
- Orlando Brdctg. Co., Inc.
- Topeka Brdctg. Ass'n., Inc.

NORTH AMERICAN B. C. STATIONS BY FREQUENCIES

WILL ak 1000 D Urbana, Ill. —University of Ill.
 WTAG ak 1000 R Worcester, Mass. —Telegram Pub. Co., Inc.

590 kcys. (508.2)

KHQ ak 1000 R (5) Spokane, Wash. —Louis Wasmer, Inc.
 WEEI ak 1000 C (5) Boston, Mass. —Columbia Brdcastg. Sys.
 WKZO ak 1000 BDX Kalamazoo, Mich. —WKZO, Inc.
 WOW ak 1000 R (5) Omaha, Nebr. —Woodmen of the World

600 kcys. (499.7)

CFCF ak 400 FN Montreal, P. Q. —Can. Marconi Co., Ltd.
 CJOR ak 500 Vancouver, B. C. —G. C. Chandler
 CMW† ak 1400 Havana, Cuba —Troncoso y Gil
 CRCW ak 500 F (1) Windsor, Ont. —Can. Brdcastg. Corp.
 KFSD ak 1000 B San Diego, Calif. —Airfan Radio Corp., Ltd.
 WCAO ak 500 C (1) Baltimore, Md. —Monumental Radio Co.
 WICC ak 500 BM (1) Bridgeport, Conn. —Yankee Network, Inc.
 WMT ak 1000 BM (5) Cedar Rapids, Iowa —Iowa Brdcastg. Co.
 WREC ck 1000 C (5) Memphis, Tenn. —WREC, Inc.

610 kcys. (491.5)

KFRC c 1000 M (5) San Francisco, Cal. —Don Lee Brdcastg. Sys.
 WDAF ak 1000 R (5) Kansas City, Mo. —Kansas City Star Co.
 WIP ak 1000 Philadelphia, Pa. —Penn. Brdcastg. Co.
 WJAY ak 500 D Cleveland, Ohio —Cleve. Radio Brdcastg. Corp.

620 kcys. (483.6)

KGW ak 1000 R (5) Portland, Ore. —Oregonian Pub. Co.
 KTAR ak 1000 N Phoenix, Ariz. —KTAR Brdcastg. Co.
 WFLA ak 1000 Na (5) Clearwater, Fla. —Chamber of Commerce.
 WHJB ak 250 CD Greensburg, Pa. —Pitt. Radio Sup. House.
 WLBZ ak 500 CM (1) Bangor, Maine —Maine Brdcastg. Co., Inc.
 WSUN ak 1000 Na (5) St. Petersburg, Fla. —Chamber of Commerce
 WTMJ ak 1000 N (5) Milwaukee, Wis. —The Journal Co.

630 kcys. (475.9)

CFCO ak 100 F Chatham, Ont. —John Beardall
 CFCY ak 1000 F Charlottetown, P.E.I. —Island Radio Brdcastg. Co.
 CJRC ak 500 F (1) Winnipeg, Man. —Jas. Richardson & Sons.
 CKOV ak 100 F Kelowna, B. C. —Okanagan Brdcasters, Ltd.
 CMCB z Havana, Cuba —"El Progreso Cubano," Aprdo 132.
 KFRU ak 500 I (1) Columbia, Mo. —KFRU, Inc.
 KGFX ak 200 D Pierre, S. Dak. —Mrs. Ida A. McNeil
 WGBF ak 500 BI (1) Evansville, Ind. —Evans on the Air, Inc.
 WMAL ak 250 B (.5) Washington, D. C. —NBC, Inc.
 WPRO ak 500 C (1) Providence, R. I. —Cherry & Webb Brdcastg. Co.
 XEZ z 500 Merida, Yuc. —Jorge L. Falomeque.

640 kcys. (468.5)

CMCB ak 150 Havana, Cuba —El Progreso Cubana
 KFI ak 50000 R Los Angeles, Calif. —Earle C. Anthony, Inc.
 WGAN z 500 DP Portland, Maine —Port. Brdcastg. Sys., Inc.
 WHKC ak 500 Columbus, Ohio —Associated Brdcastg. Corp.
 WOI ak 5000 D Ames, Iowa —State Col. of Agriculture
 XEBX z 250 Sabinas, Coah. —Benito Garza Ortegon

650 kcys. (461.3)

WSM ak 50000 MN Nashville, Tenn. —Nat'l. Life & Accident

660 kcys. (454.3)

WAAW ak 500 D Omaha, Nebr. —Omaha Grain Exchange
 WEAF ak 50000 R New York, N. Y. —NBC, Inc.
 XEAL z 1000 Mexico City, D. F. —Cia. Pan-Americana de Radio
 XEAO ak 250 Mexicali, B. Cfa. —Luis L. Castro

670 kcys. (447.5)

WMAQ ak 50000 R Chicago, Ill. —NBC, Inc.

NORTH AMERICAN B. C. STATIONS BY FREQUENCIES

680 kcys. (440.9)

CMCG	ak	1000	.....	Havana, Cuba	—La Onda, S. A.
KFEQ	ak	2500	D	St. Joseph, Mo.	—KFEQ, Inc.
KPO	ak	50000	R	San Francisco, Cal.	—NBC, Inc.
VAS	akn	2000	685	Glace Bay, N. S.	—Can. Marconi Co., Inc.
VOWR	ck	500	681	St. John's, Nfld.	—Wesley United Church
WLAW	z	1000	DP	Lawrence, Mass.	—Hildreth & Rogers Co.
WPTF	ak	1000	N (5)	Raleigh, N. C.	—WPTF Radio Co.

690 kcys. (434.5)

CFRB	ak	10000	C	Toronto, Ont.	—Rogers Radio Brdcastg. Co.
CJCJ	ak	100	F	Calgary, Alta.	—Albertan Publishers, Ltd.
XET	ak	5000	Monterrey, N. L.	—El Pregonero del Norte

700 kcys. (428.3)

WLW	ak	500000	MN (W8XO)	Cincinnati, O.	—Crosley Radio Corp.
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710 kcys. (422.3)

KIRO	ak	1000	Seattle, Wash.	—Queen City Brdcastg. Co.
KMPC	ak	500	Beverly Hills, Calif.	—B. Hills Brdcastg. Corp.
WOR	ak	50000	M	Newark, N. J.	—Bamberger Brdcastg. Serv., Inc.

720 kcys. (416.4)

WGN	ak	50000	M	Chicago, Ill.	—WGN, Inc.
XEH	ak	250	.....	Monterrey, N. L.	—Constantino de Ternava

730 kcys. (410.7)

CFPL	ak	100	F	London, Ont.	—London Free Press
CJCA	ak	1000	F	Edmonton, Alta.	—Taylor & Pearson Brdcastg. Co.
CKAC	ak	5000	C	Montreal, P. O.	—La Presse Pub. Co.
CKPR	ak	100	F	Fort William, Ont.	—Dougall Motor Car Co.
CMK	ak	3000	.....	Havana, Cuba	—Cia. Nacional de Radio
XEPN	ak	100000	.....	Piedras Negras, Coah.	—P. N. Brdcastg. Co.

740 kcys. (405.2)

KMMJ	ak	1000	D	Clay Center, Nebr.	—KMMJ, Inc.
KTRB	ak	250	D	Modesto, Calif.	—McTammany & Bates.
WHBB	ak	250	D	Portsmouth, N. H.	—Granite State Brdcastg. Corp.
WSB	ak	50000	N	Atlanta, Ga.	—Atlanta Journal Co.

750 kcys. (399.8)

CMCW	dk	150	.....	Havana, Cuba	—“Radio Pilot.”
KGU	aj	2500	N	Honolulu, Hawaii	—Advertiser Pub. Co., Ltd.
WJR	ak	50000	C	Detroit, Mich.	—The Goodwill Station
XEAM	z	25	.....	Matamoros, Tams.	—Manuel Salines.

760 kcys. (394.5)

CMHX	ak	200	.....	Cienfuegos, Cuba	—F. Chavarry.
KXA	ak	250	(.5)	Seattle, Wash.	—Am. Radio Tel. Co.
WBAL	ak	2500	BMSy	Baltimore, Md.	—WBAL Brdcastg. Co.
WEW	ak	1000	D	St. Louis, Mo.	—St. Louis University
WJZ	ak	50000	BSy	New York, N. Y.	—NBC, Inc.
XEOK	ak	2500	.....	Tijuana, B. Cfa.	—Carlos de la Serra

770 kcys. (389.4)

CMBS	ak	150	.....	Havana, Cuba	—“Radio Grunow”
KFAB	ak	10000	CSy	Lincoln, Nebr.	—KFAB Brdcastg. Co.
WBBM	ak	50000	CSy	Chicago, Ill.	—Columbia Brdcastg. Sys.

780 kcys. (384.4)

CHWK	dk	100	F	Chilliwack, B. C.	—Chil. Brdcastg. Co., Ltd.
CKSO	ak	1000	F	Sudbury, Ont.	—Sudbury Star

NORTH AMERICAN B. C. STATIONS BY FREQUENCIES

CMJK	ak	250	....	Camaguey, Cuba	—Cla. Nacional de Radio
KEHE	ak	1000	(5)	Los Angeles, Calif.	—Hearst Radio, Inc.
KFDY	ak	1000	D	Brookings, S. Dak.	—S. Dak. State College
KFDY	ck	250	....	Anchorage, Alaska	—Anchorage Radio Club, Inc.
KGHL	ak	1000	N (5)	Billings, Mont.	—N. W. Auto Supply Co.
WEAN	ak	1000	BM	Providence, R. I.	—Yankee Network, Inc.
WMC	ak	1000	N (5)	Memphis, Tenn.	—M. Commercial Appeal Co.
WTAR	ak	1000	N	Norfolk, Va.	—WTAR Radio Corp.
XEL	z	1000	....	Mexico City, D. F.	—Plaza de San Juan 15.

790 kcys. (379.5)

CMGH	ak	500	....	Matanzas, Cuba	—"Rialto."
KGO	ak	7500	B	San Francisco, Cal.	—NBC, Inc.
KOAM	z	1000	DP	Pittsburg, Kans.	—Pittsburg Brdcastg. Co.
WGY	ak	50000	R	Schenectady, N. Y.	—General Electric Co.

800 kcys. (374.8)

WBAP	ak	50000	Na	Fort Worth, Texas	—Ft. Worth Star-Telegram
WFAA	ak	50000	Na	Dallas, Texas	—A. H. Belo Corp.
WTBO	ak	250	D	Cumberland, Md.	—Associated Brdcastg. Corp.

810 kcys. (370.2)

CMCF	ak	600	....	Havana, Cuba	—Oscar Gutierrez
WCCO	ak	50000	C	Minneapolis, Minn.	—Columbia Brdcastg. Sys.
WNYC	ak	1000	D	New York, N. Y.	—City of N. Y.
XEDF	z	75	....	Nuevo Laredo, Tams.	—Sr. Ruperto Villarreal.
XEXC	z	350	....	Aguascalientes, Ags.	—Gobierno del E. de Ags.

820 kcys. (365.6)

CMHW	ak	100	....	Cienfuegos, Cuba	—Ramon Gonzales
WHAS	ak	50000	C	Louisville, Ky.	—Louisville Times Co.
XEBG	z	1000	....	Tijuana, B. Cfa.	—Angel B. Fernandez

830 kcys. (361.2)

CMJX	ak	500	....	Camaguey, Cuba	—Teatro Principal
KOA	ak	50000	N	Denver, Colo.	—NBC, Inc.
WEEU	ak	1000	D	Reading, Pa.	—Berks Brdcastg. Co.
WHDH	ak	1000	Dn	Boston, Mass.	—Matheson Radio Co., Inc.
WRUF	ak	5000	Dn	Gainesville, Fla.	—University of Fla.

840 kcys. (356.9)

CFOG	ak	1000	F	Saskatoon, Sask.	—A. A. Murphy & Sons.
CRCT	ak	5000	FN	Toronto, Ont.	—Can. Brdcastg. Corp.
VOGY	ak	400	....	St. John's, Nfld.	—Newfoundland Hotel
XERA	ck	350000	....	Villa Acuna, Coah.	—Brinkley Hospital

850 kcys. (352.7)

CMCM	z	....	....	Havana, Cuba	—"Radio Columbia," 23 No. 482, Vedado.
KIEV	ak	250	D	Glendale, Calif.	—Cannon System, Ltd.
WESG	ak	1000	CD	Elmira, N. Y.	—Cornell University
WKAR	ak	1000	D	E. Lansing, Mich.	—Mich. State College
WWL	ak	10000	C	New Orleans, La.	—Loyola University.

860 kcys. (348.6)

WABC	ak	50000	C (WBOQ)	New York, N. Y.	—Columbia Brdcastg. Sys.
WHB	ak	1000	DM	Kansas City, Mo.	—WHB Brdcastg. Co.
XEMO	ak	5000	....	Tijuana, B. Cfa.	—Box 202, San Diego, Calif.
XENC	z	50	....	Mexico City, D. F.	—Ignacio Barrueta

870 kcys. (344.6)

WENR	ak	50000	Ba	Chicago, Ill.	—NBC, Inc.
WLS	ak	50000	Na	Chicago, Ill.	—Agricultural Brdcastg. Co.
XEPB	ak	200	....	Monterrey, N. L.	—Jesus Quintanilla.

NORTH AMERICAN B. C. STATIONS BY FREQUENCIES

880 kcys. (340.7)

CFJC	ak	100	F	Kamloops, B. C.	—Review Pub. Co.
CMQ	ak	2500	X	Havana, Cuba	—La Casa de las Medias
CRCO	ak	1000	F	Ottawa, Ont.	—Can. Brdcastg. Corp.
KFKA	ak	500	2M (1)	Greeley, Colo.	—Mid-Western Radio Corp.
KLX	ak	1000	.....	Oakland, Calif.	—Tribune Bldg. Co.
KPOF	ak	500	2	Denver, Colo.	—Pillar of Fire
WCOC	ak	500	2	Meridian, Miss.	—Miss. Brdcastg. Co., Inc.
WGSI	ak	500	C1 (1)	Scranton, Pa.	—Scranton Brdcasters, Inc.
WQAN	ak	500	1 (1)	Scranton, Pa.	—Scranton Times, 149 Penn Ave.
WRNL	ak	500	D	Richmond, Va.	—WLBG, Inc.
WSUI	ak	500	(1)	Iowa City, Iowa	—State Univ. of Iowa.

890 kcys. (336.9)

KARK	ak	500	B (1)	Little Rock, Ark.	—Ark. Radio & Equip. Co.
KPNF	ak	500	2 (1)	Shenandoah, Iowa	—KFNF, Inc.
KFPY	ak	1000	C (5)	Spokane, Wash.	—Symons Brdcastg. Co.
KUSD	ak	500	2	Vermillion, S. Dak.	—Univ. of S. Dak.
WBAA	ak	500	(1)	W. Lafayette, Ind.	—Purdue University
WGST	ak	1000	C (5)	Atlanta, Ga.	—Ga. School of Technology
WJAR	ak	1000	R	Providence, R. I.	—Outlet Co.
WMMN	ak	500	C (1)	Fairmont, W. Va.	—Monongahela Valley Brdcastg. Co.
XEW	ak	50000	.....	Mexico City, D. F.	—Cadena Radiodifusora Mex.

900 kcys. (333.1)

KGBU	ak	500	X	Ketchikan, Alaska	—Aaa. Radio & Serv. Co.
KHJ	ak	1000	M (5)	Los Angeles, Calif.	—Don Lee Brdcastg. Sys.
KSEI	ak	250	(1)	Pocatello, Idaho	—Radio Serv. Corp.
WBEN	ak	1000	R (5)	Buffalo, N. Y.	—WBEN, Inc.
WELI	ak	500	D	New Haven, Conn.	—City Brdcastg. Corp.
WFMJ	ak	500	D	Frederick, Md.	—Monocacy Brdcastg. Co.
WJAX	ak	1000	N (5)	Jacksonville, Fla.	—City of Jacksonville.
WKY	ak	1000	N (5)	Oklahoma City, Ok.	—WKY Radiophone Co.
WLBL	ak	2500	DX	Stevens Point, Wis.	—State of Wis.
WTAD	ak	1000	D	Quincy, Ill.	—Ill. Brdcastg. Corp.

910 kcys. (329.6)

CJAT	ak	1000	F	Trail, B. C.	—Kootenay Brdcastg. Co.
CKY	ak	15000	F	Winnipeg, Man.	—Man. Telephone Sys.
CRCM	ak	5000	F	Montreal, P. Q.	—Can. Brdcastg. Corp.
XENT	ak	150000	.....	Nuevo Laredo, Tams.	—Box 410, Laredo, Texas

920 kcys. (325.9)

CMX	ak	1000	.....	Havana, Cuba	—Casa Lavin
KFEL	ak	500	Ma	Denver, Colo.	—Eugene P. O'Fallon, Inc.
KOMO	ak	1000	R (5)	Seattle, Wash.	—Fishers Blend Station, Inc.
KPRC	ak	1000	N (5)	Houston, Texas	—Houston Ptg. Corp.
KVOD	ak	500	Ba	Denver, Colo.	—Colo. Radio Corp.
WAAF	ak	1000	D	Chicago, Ill.	—Drovers Journal Pub. Co.
WORL	ak	500	D	Boston, Mass.	—Brdcastg. Serv. Org., Inc.
WPEN	ak	1000	1	Philadelphia, Pa.	—Wm. Penn Brdcastg. Co.
WRAX	ak	1000	1	Philadelphia, Pa.	—WRAX Brdcastg. Co.
WSPA	ak	1000	D	Spartanburg, S. C.	—Voice of S. C.
WWJ	ak	5000	R	Detroit, Mich.	—Evening News Ass'n.
XEAA	ak	200	.....	Mexicali, B. Cfa.	—Box 714, Calexico, Calif.

930 kcys. (322.4)

CFAC	ak	100	F	Calgary, Alta.	—Taylor, Pearson & Carson
CFCH	ak	100	F	North Bay, Ont.	—Northern Brdcastg. Co., Ltd.
CFLC	ak	100	.....	Prescott, Ont.	—Radio Ass'n. of Prescott
CHNS	ak	1000	F	Halifax, N. S.	—Maritime Brdcastg. Co., Ltd.
CKPC	ak	100	F	Brantford, Ont.	—Telephone City Brdcastg. Ltd.
KMA	ak	1000	(5)	Shenandoah, Iowa	—May Seed and Nursery Co.
KROW	ak	1000	.....	Oakland, Calif.	—Educational Brdcastg. Corp.
WBRC	ak	1000	C	Birmingham, Ala.	—Birm. Brdcastg. Co., Inc.
WDBJ	ak	1000	C (5)	Roanoke, Va.	—Times World Corp.
XEBH	ak	500	.....	Hermosillo, Son.	—Carlos Halderamma

NORTH AMERICAN B. C. STATIONS BY FREQUENCIES

940 keys. (319.0)

KOIN	ak	1000	G (5)	Portland, Ore.	— KOIN, Inc.
VOAS	ak	100	.....	St. John's, Nfld.	— Ayre & Sons, Ltd.
WAAT	ak	500	D	Jersey City, N. J.	— Bremer Brdcastg. Corp.
WAVE	ak	1000	N	Louisville, Ky.	— WAVE, Inc.
WCSH	ak	1000	R (2.5)	Portland, Maine	— Congress Sq. Hotel Co.
WDAY	ak	1000	N (5)	Fargo, N. Dak.	— WDAY, Inc.
WHA	ak	5000	D	Madison, Wis.	— University of Wis.
WICA	z	250	DP	Ashtabula, Ohio	— Ash. Star-Beacon
XFFO	ak	5000	.....	Mexico City, D. F.	— Radio Nacional
XEYO	z	500	.....	Mexico City, D. F.	— Partido Nac. Revolucionaria

950 keys. (315.6)

CJOC	ak	100	F	Lethbridge, Alta.	— Lethbridge Brdcastg. Co.
CMCD	ak	250	.....	Havana, Cuba	— "La Voz del Aire," S. A.
CRCS	ak	100	F	Chicoutimi, P. Q.	— Can. Brdcastg. Corp.
KFWB	ak	1000	(5)	Hollywood, Calif.	— Warner Bros. Brdcastg. Corp.
KMBC	ak	1000	C (5)	Kansas City, Mo.	— Midland Brdcastg. Co.
WHAL	z	500	DP	Saginaw, Mich.	— Gross & Shields
WRC	ak	500	RX (1)	Washington, D. C.	— NBC, Inc.

960 keys. (312.3)

CFRN	ak	100	F	Edmonton, Alta.	— Sunwapta Brdcastg. Co.
CHNC	ak	1000	F	New Carlisle, P. Q.	— Gaspesian Radio Co.
XEAW	c	50000	.....	Reynosa, Tams.	— Cia. Int. Difusora Reynosa

970 keys. (309.1)

CMBY	z	150	.....	Havana, Cuba	— Calle Infanta 132
CMGF	ak	100	977	Matanzas, Cuba	— B. de la Torre, Gral Betancourt 51.
KJR	ak	5000	B	Seattle, Wash.	— Fishers Blend Sta., Inc.
WCFL	ak	5000	B	Chicago, Ill.	— Chi. Fed. of Labor.
WIBG	ak	100	D	Glenside, Pa.	— Seaboard Radio Bc. Corp.

980 keys. (306.0)

KDKA	ak	50000	B	Pittsburgh, Pa.	— Westinghouse Elec.
XEAC	ak	250	.....	Tijuana, B. Cfa.	— Aurelio Mateus
XEFE	z	150	.....	Nuevo Laredo, Tams.	— "Voice of the Border."

990 keys. (302.8)

WBZ	ak	50000	BSy	Boston, Mass.	— Westinghouse Elec. Co.
WBZA	ak	1000	BSy	Springfield, Mass.	— Westinghouse Elec. Co.
XEAF	ak	750	.....	Nogales, Son.	— Francisco G. Elias
XEK	ak	100	.....	Mexico City, D. F.	— Arturo Martinez
XES	ak	250	.....	Tampico, Tams.	— Fernando Sada

1000 keys. (299.8)

CMBZ	ak	500	(1)	Havana, Cuba	— Manuel y G. Salas
KFVD	ak	1000	Dn	Los Angeles, Calif.	— Standard Brdcastg. Co.
VOCM	z	200	1006	St. John's, Nfld.	— St. John's Eve. Telegram
WHIO	ak	50000	R	Des Moines, Iowa	— Central Brdcastg. Co.
XEBI	ak	25	.....	Aguascalientes, Ags.	— Alejandro Diaz
XEBK	ak	100	.....	Nuevo Laredo, Tams.	— "Indo Latin Voice."
XEXS	z	100	.....	Portable in Mexico	— Dpto. de Salubridad Publica

1010 keys. (296.9)

CHML	ak	100	F	Hamilton, Ont.	— Maple Leaf Radio Co., Ltd.
CKCD	ak	100	1	Vancouver, B. C.	— Van. Daily Province
CKCK	ak	500	FX	Regina, Sask.	— Leader-Post, Ltd.
CKCO	ak	100	F	Ottawa, Ont.	— Dr. G. M. Geldert
CKIC	ak	50	.....	Wolfville, N. S.	— Acadia University
CKWX	ak	100	FI	Vancouver, B. C.	— Western Brdcastg. Co.
CMJA	ak	300	.....	Camaguey, Cuba	— Rafael Valdez
KGGF	ak	1000	2	Coffeyville, Kans.	— Powell & Platz
KGW	ak	1000	M	San Jose, Calif.	— Station KQW, 87 E. San Antonio St.
WHN	ak	1000	(5)	New York, N. Y.	— Marcus Loew Booking Agency
WNAD	ak	1000	2	Norman, Okla.	— University of Okla.

NORTH AMERICAN B. C. STATIONS BY FREQUENCIES

WNOX ak 1000 G (5) Knoxville, Tenn. —Scripps-Howard Radio, Inc.
 XEU ak 250 Veracruz, Ver. —Fernando Pazos S.

1020 kcys. (293.9)

KYW ak 10000 R Philadelphia, Pa. —Westinghouse Elec. Co.
 WDZ ak 250 D Tuscola, Ill. —WDZ Brdcastg. Co.
 XEJ ak 1000 Juarez, Chih. —Juan G. Buttner

1030 kcys. (291.1)

CFCN ak 10000 Calgary, Alta. —Voice of the Prairies, Ltd.
 CKLW ak 5000 M Windsor, Ont. —West. Ont. Brdcastg. Co.
 CMCX z 150 Havana, Cuba. —"La Onda Popular."
 XEB ak 10000 Mexico City, D. F. —El Buen Tono, S. A.

1040 kcys. (288.3)

KRLD ak 10000 C Dallas, Texas. —KRLD Radio Corp.
 KWJJ ak 500 Portland, Ore. —KWJJ Brdcastg. Co., Inc.
 KYOS z 250 D Merced, Calif. —Merced Star Pub. Co.
 WTIC ah 50000 R Hartford, Conn. —Travelers Brdcastg. Service

1050 kcys. (285.5)

CMKD ak 250 Santiago, Cuba. —Radioemisora Oriental
 CRCK ak 1000 F Quebec, P. Q. —Can. Brdcastg. Corp.
 KFBI ak 5000 Dn Abilene, Kans. —Farmers & Bankers Bc. Corp.
 KNX ak 50000 C Los Angeles, Calif. —CBS of Calif., Inc.
 WEAU z 1000 D Eau Claire, Wis. —Central Brdcastg. Co.
 WGVV z 1000 DP Indianapolis, Ind. —Glenn Van Auker

1060 kcys. (282.8)

KTHIS ak 10000 N Hot Springs, Ark. —Chamber of Commerce
 VOAC z 40 1065 St. John's, Nfld. —
 WBAL ak 10000 BM Baltimore, Md. —WBAL Brdcastg. Co.
 WJAG ak 1000 D Norfolk, Nebr. —Norfolk Daily News.
 W3XJ z 100 P College Park, Md. —McNary & Chambers
 XEAD ak 125 Guadalajara, Jal. —Alberto Palos Sauza
 XEMG z 100 Atzacapotzalco, D. F. —Humberto Garcia Ruiz

1070 kcys. (280.2)

CMBX ak 500 Havana, Cuba. —Alberto Alvarez
 CMHA z 50 Sagua la Grande, Cuba —Abelardo Menocal
 KJBS ak 500 San Francisco, Calif. —Julius Brunton & Sons
 WCAZ ak 100 D Carthage, Ill. —Superior Brc. Serv., Inc.
 WTAM ak 50000 R Cleveland, Ohio. —NBC, Inc.

1080 kcys. (277.6)

WBT ak 50000 C Charlotte, N. C. —Columbia Brdcastg. Sys.
 WCBQ ak 5000 Dnl Chicago, Ill. —WCBQ, Inc.
 WMBI ak 5000 Dnl Chicago, Ill. —Moody Bible Institute
 XEBA z 20 Guzman, Jal. —Javier Velasco
 XEDP ak 500 Mexico City, D. F. —Dpto. de Publicidad

1090 kcys. (275.1)

KMOX ak 50000 C St. Louis, Mo. —Columbia Brdcastg. Sys.

1100 kcys. (272.6)

CMCJ ak 500 Havana, Cuba. —Radio Emisora Comercial
 CRCV ak 5000 F Vancouver, B. C. —Can. Brdcastg. Corp.
 KGDW ak 1000 DM Stockton, Calif. —E. F. Pepper
 KWKH c 10000 C Shreveport, La. —Internat'l. Brc. Corp.
 WBIL ak 5000 I New York, N. Y. —Arde Bulova
 WPG ak 5000 Cl Atlantic City, N. J. —City of Atlantic City

1110 kcys. (270.1)

KSOO ak 2500 BDn Sioux Falls, S. Dak. —S. F. Brdcastg. Ass'n.

NORTH AMERICAN B. C. STATIONS BY FREQUENCIES

WRVA	ak	5000	CM	Richmond, Va.	—Larus & Bros. Co.
XELO	ak	50000		Tijuana, B. Cfa.	.....

1120 kcys. (267.7)

CHLP	ak	100	F	Montreal, P. O.	—La Patrie Pub. Co.
CHSJ	ak	500	F (1)	St. John, N. B.	—N. B. Brdcstg. Co.
CKOC	ak	500	F (1)	Hamilton, Ont.	—Westworth Radio Brdcstg. Co.
CKX	ak	1000	F	Brandon, Man.	—Man. Telephone System. Rosser Ave.
CMKM	ak	200		Manzanillo, Cuba	—Merchan P. Figeredo
KFIG	ak	100	D	Spokane, Wash.	—Spokane Brdcstg. Corp.
KFSG	ak	500	a (2.5)	Los Angeles, Calif.	—Echo Park Evan. Ass'n.
KRKD	ak	500	a (2.5)	Los Angeles, Calif.	—Radio Brdcsters., Inc.
KRSC	ak	250		Seattle, Wash.	—Radio Sales Corp.
KTBC	z	1000	DP	Austin, Texas	—State Capitol Brdcstg. Assn.
WCOP	ak	500	D	Boston, Mass.	—Mass. Brdcstg. Corp.
WDLE	ak	250	R (5)	Wilmington, Del.	—WDEL, Inc.
WISN	ak	250	C (1)	Milwaukee, Wis.	—Hearst Radio, Inc.
WJBO	ak	500	B	Baton Rouge, La.	—B. R. Brdcstg. Co., 334 Florida St.
WTAW	ak	500		College Sta., Tex.	—Agri. & Mechanical Col.

1130 kcys. (265.3)

CMJI	ak	150		Ciego de Avila, Cuba	—Gilberto Gesse Lopez
KSL	ak	50000	C	Salt Lake City, Ut.	—Radio Service Corp.
WJJD	ak	20000	Dn	Chicago, Ill.	—WJJD, Inc.
WOV	ak	1000	D	New York, N. Y.	—Internat'l. Brc. Corp.
XEJP	z	100		Mexico City, D. F.	—Salvador Monterrubio

1140 kcys. (263.0)

CMBG	z	200		Havana, Cuba	—John L. Stowers
KVOO	ak	25000	N1	Tulsa, Okla.	—Southwestern Sales Corp.
WAPI	ak	5000	N1	Birmingham, Ala.	—Ala. Polytechnic Inst.
WSPR	ak	500	DM	Springfield, Mass.	—Conn. Valley Brdcstg. Co.

1150 kcys. (260.7)

CMJF	z	200		Camaguey, Cuba	—John L. Stowers
WHAM	ak	50000	B	Rochester, N. Y.	—Stromberg-Carlson Co.
XEC	ak	100		Tijuana, B. Cfa.	—Luis F. Enciso
XEDW	z	20		Minatitlan, Ver.	—Hector Silva Canto

1160 kcys. (258.5)

CMHJ	ak	175		Cienfuegos, Cuba	—Romualdo Ugalde
CMKG	z			Santiago, Cuba	.....
WOWO	ak	10000	BI	Fort Wayne, Ind.	—Westinghouse Radio Station
WWVA	ak	5000	CI	Wheeling, W. Va.	—W. Va. Brdcstg. Corp.
XEAS	ak	50		Saltillo, Coah.	—“La Voz del Comercio.”
XEBJ	z	20		Merida, Yuc.	—Hidalgo Comercio
XEBZ	ad	100		Mexico City, D. F.	—Refugio Esperza Vda.
XED	ak	2500		Guadalajara, Jal.	—Cia. Radiofonografica
XEP	ak	500		Juarez, Chih.	—Apartado 89

1170 kcys. (256.3)

CMBD	ak	500		Havana, Cuba	—Luiz Perez Garcia
WCAU	ak	50000	C	Philadelphia, Pa.	—WCAU Brdcstg. Co.

1180 kcys. (254.1)

CMJO	ak	50		Ciego de Avila, Cuba	—B. Ildefonso
KEX	ak	5000	B2	Portland, Ore.	—Oregonian Pub. Co.
KOB	ak	10000	B2	Albuquerque, N. M.	—Albuquerque Brdcstg. Co.
WDGY	ak	1000	Dn (5)	Minneapolis, Minn.	—Dr. Geo. W. Young
WINS	ak	1000		New York, N. Y.	—Hearst Radio, Inc.
WMAZ	ak	1000	C	Macon, Ga.	—Southeastern Brdcstg. Co.
XEFA	z	500		Tacuba, D. F.	—Eduardo Limon Segui

1190 kcys. (252.0)

CMKX	z			Santiago, Cuba	.....
KTKC	z	250	DP	Visalia, Calif.	—Tulare-Kings Counties

NORTH AMERICAN B. C. STATIONS BY FREQUENCIES

VONF	ak	500	1195	St. John's, Nfld.	—Dominion Brdcastg. Co.
WATR	ak	100	DXZ	Waterbury, Conn.	—WATR Co., Inc.
WOAI	ak	50000	N	San Antonio, Tex.	—Southland Industries, Inc.
WSAZ	ak	1000	.....	Huntington, W. Va.	—WSAZ, Inc.

1200 keys. (249.9)

CHAB	ak	100	F	Moose Jaw, Sask.	—CHAB, Ltd.
CKNX	dk	50	.....	Wingham, Ont.	—Wingham Radio Club
CKTB	ak	100	F	St. Catharines, Ont.	—Silver Spire Brdcastg. Station
CMCO	ad	250	.....	Havana, Cuba	—Enrique Lasanta
KADA	ak	100	DM	Ada, Okla.	—C. C. Morris
KBTM	ak	100	D	Jonesboro, Ark.	—W. J. Beard
KDNC	z	100	(.25) P	Lewistown, Mont.	—Democrat-News Co.
KELO	z	100	P	Sioux Falls, S. Dak.	—S. F. Brdcastg. Ass'n.
KFJB	ak	100	(.25)	Marshalltown, Ia.	—Marshall Elec. Co., Inc.
KFXD	ak	100	(.25)	Nampa, Idaho	—Frank E. Hurt
KFXJ	ak	100	(.25)	Grand Junc., Colo.	—Western Slope Brdcastg. Co.
KGDE	c	100	(.25)	Fergus Falls, Minn.	—Charles L. Jaren
KGEK	ak	100	.....	Sterling, Colo.	—Elmer G. Beehler
KGJF	ak	100	.....	Los Angeles, Calif.	—Ben S. McGlashan
KGHI	ak	100	(.25)	Little Rock, Ark.	—Ark. Brdcastg. Co.
KGLV	z	100	DP	Greenville, Texas	—Hunt Brdcastg. Assn.
KMLB	ak	100	(.25)	Monroe, La.	—Liner's Brdcastg. Station
KOOS	ak	100	(.25)	Marshfield, Ore.	—Pacific Radio Corp.
KSUN	c	100	(.25)	Lowell, Ariz.	—Copper Elec. Co., Inc.
KVCV	z	100	.....	Redding, Calif.	—Golden Empire Brdcastg. Co.
KVEE	z	250	D	San Luis Obispo, Calif.	—Valley Elec. Co.
KVOS	dk	100	N	Bellingham, Wash.	—KVOS, Inc.
KWG	ak	100	N	Stockton, Calif.	—McClatchey Brdcastg. Co.
KWNO	z	100	DP	Winona, Minn.	—Winona Radio Service.
WABI	ak	100	(.25)	Bangor, Maine	—Community Brdcastg. Serv.
WAIM	ak	100	C	Anderson, S. C.	—Wilton E. Hall
WAYX	ak	100	C	Waycross, Ga.	—Waycross Brdcastg. Co.
WBBZ	ak	100	M (.25)	Ponca City, Okla.	—Adelaide L. Carrell
WBHP	ak	100	.....	Huntsville, Ala.	—Wilton Harvey Pollard
WBNO	ak	100	2	New Orleans, La.	—Coliseum Place Bap. Church
WCAT	ak	100	D	Rapid City, S. Dak.	—S. Dak. State School of Mines
WCAX	ak	100	(.25)	Burlington, Vt.	—Bur. Daily News, Inc.
WCLO	ak	100	(.25)	Janesville, Wis.	—Gazette Ptg. Co.
WCPO	ak	100	(.25)	Cincinnati, Ohio	—Scripps-Howard Radio, Inc.
WDSM	z	100	P	Superior, Wis.	—Fred A. Baxter
WEST	ak	100	3 (.25)	Easton, Pa.	—Associated Brdcastrs., Inc.
WFAM	ak	100	4	South Bend, Ind.	—South Bend Tribune
WFTC	ak	100	(.25)	Kinston, N. C.	—Jonas Weiland
WHBC	ak	100	(.25)	Canton, Ohio	—Edw. P. Graham
WHBY	ak	100	(.25)	Green Bay, Wis.	—WHBY, Inc.
WIBX	ak	100	C (.3)	Utica, N. Y.	—WIBX, Inc.
WIL	ak	100	(.25)	St. Louis, Mo.	—Mo. Brdcastg. Corp.
WJBC	ak	100	5 (.25)	Bloomington, Ill.	—Kaskaskia Brdcastg. Co.
WJBL	ak	100	5	Decatur, Ill.	—Commodore Brdcastg. Co.
WJBW	ak	100	2	New Orleans, La.	—Chas. C. Carlson, Godchaux Bldg.
WJNO	ak	100	C (.25)	W. Palm Beach, Fla.	—Hazelwood, Inc.
WJRD	c	100	DX	Tuscaloosa, Ala.	—James R. Doss, Jr.
WKBO	ak	100	3 (.25)	Harrisburg, Pa.	—Keystone Brdcastg. Corp.
WLVA	ak	100	(.25)	Lynchburg, Va.	—Lynchburg Brdcastg. Corp.
WMFR	ak	100	D	High Point, N. C.	—Station WMFR, Inc.
WMPC	ak	100	(.25)	Lapeer, Mich.	—1st Methodist Church
WOLS	z	100	DP	Florence, S. C.	—O. Lee Stone
WRBL	ak	100	(.25)	Columbus, Ga.	—WRBL Radio Station, Inc.
WSAL	z	250	DP	Salisbury, Md.	—Frank M. Stearns.
WTHT	z	100	M	Hartford, Conn.	—Hartford Times, Inc.
WTOL	z	100	DP	Toledo, Ohio	—Community Brdcastg. Co.
WWAE	ak	100	8	Hammond, Ind.	—Hammond-Calumet Brdcastg. Corp.

1210 keys. (247.8)

CJCS	ak	50	.....	Stratford, Ont.	—M. I. Higgins
CJCU	z	50	.....	Aklavik, N.W.T.	—Dr. J. A. Urquhar
CKBI	ak	100	F	Prince Albert, Sask.	—CKBI, Ltd.
CKCH	ak	100	F	Hull, P. Q.	—CKCH Hull Brdcastg. Co., Ltd.
CKMC	ak	50	.....	Cobalt, Ont.	—R. L. MacAdam
CMHI	ak	150	.....	Santa Clara, Cuba	—Lavis y Paz
KALB	ak	100	.....	Alexandria, La.	—Alexandria Brdcastg. Co.
KANS	ak	100	B	Wichita, Kans.	—KANS Brdcastg. Co.
KASA	c	100	M	Elk City, Okla.	—E. M. Woody
KDLR	ak	100	.....	Devils Lake, N. D.	—KDLR, Inc.
KDON	z	100	M	Monterrey, Calif.	—Mont. Peninsula Brdcastg. Co.

NORTH AMERICAN B. C. STATIONS BY FREQUENCIES

KFJI	ak	100	Klamath Falls, Ore.	—KFJI Brcdsters, Inc.
KFOR	ak	100	GM (25) Lincoln, Nebr.	—Cornbelt Brcdstg. Corp.
KFPW	ak	100	Fort Smith, Ark.	—Southwestern Hotel Co.
KFPV	ak	100	5 (25) Cape Girardeau, Mo.	—Hirsch Battery & Radio Co., Box 275.
KFXM	ak	100	M2 San Bernardino, Cal.	—Lee Bros. Brcd. Co., Calif. Hotel.
KGLO	z	100	C Mason City, Iowa	—Mason City Globe Gazette
KGY	ak	100	Olympia, Wash.	—KGY, Inc.
KHBG	z	100	DP Okmulgee, Okla.	—Okmulgee Brcdstg. Corp.
KIUL	ak	100	Garden City, Kans.	—Garden City Brcdstg. Co.
KLAH	ak	100	Carlsbad, N. Mex.	—Carlsbad Brcdstg. Co.
KOCA	z	100	Kilgore, Texas	—Oil Capital Brcdstg. Ass'n.
KPPA	z	100	P (25) Helena, Mont.	—Peoples Forum of the Air
KPPC	ak	100	2 Pasadena, Calif.	—Pas. Presb. Church, 585 E. Colorado.
KROY	ak	100	D Sacramento, Calif.	—Royal Miller
KVSO	ak	100	M Ardmore, Okla.	—Ardmoreite Pub. Co.
KWTFN	ak	100	Watertown, S. Dak.	—Greater Kameska Radio Corp.
WALR	ak	100	Zanesville, Ohio	—WALR Brcdstg. Corp.
WBAX	ak	100	S Wilkes-Barre, Pa.	—John H. Stenger, Jr.
WBBL	ak	100	D Richmond, Va.	—Grace Presb. Church
WBLV	ak	100	3 Lima, Ohio	—Herbert Lee Bly
WBRB	ak	100	N Red Bank, N. J.	—Monmouth Brcdstg. Co.
WCOL	ak	100	3 Columbus, Ohio	—WCOL, Inc.
WCRW	ak	100	4 Chicago, Ill.	—Clinton R. White
WEBO	ak	100	5 (25) Harrisburg, Ill.	—Harrisburg Brcdstg. Co., 100 E. Poplar.
WEDC	ak	100	4 Chicago, Ill.	—Emil Denmark
WFAS	ak	100	3 White Plains, N. Y.	—Westchester Brcdstg. Corp.
WFOY	z	100	St. Augustine, Fla.	—Fountain of Youth Properties
WGBB	ak	100	3 Freeport, N. Y.	—Harry H. Carman
WGCM	ak	100	(25) Gulfport, Miss.	—WGCM, Inc.
WGNV	ak	100	3 Newburgh, N. Y.	—Peter Goeltz
WHBF	ak	100	(25) Rock Island, Ill.	—R. I. Brcdstg. Co.
WHBU	ak	100	(25) Anderson, Ind.	—Anderson Brcdstg. Corp.
WIBU	ak	100	(25) Poynette, Wis.	—Wm. C. Forrest
WJBY	ak	100	Gadsden, Ala.	—Gadsden Brcdstg. Co.
WJEJ	ak	100	D Hagerstown, Md.	—Hagerstown Brcdstg. Co.
WJIM	z	100	(25) Lansing, Mich.	—Harold C. Gross
WJTN	ak	100	B (25) Jamestown, N. Y.	—James Brcdstg. Co., Inc.
WJW	ak	100	(25) Akron, Ohio	—WJW, Inc.
WKOK	ak	100	Sunbury, Pa.	—Sunbury Brcdstg. Corp.
WLUM	z	100	P (25) Middlesboro, Ky.	—Lincoln Mem. University
WMFG	ak	100	(25) Hibbing, Minn.	—Head of the Lakes Brcdstg. Co.
WMFN	ak	100	Grenada, Miss.	—P. K. Ewing
WOMT	ak	100	Manitowoc, Wis.	—Francis M. Kadow
WPAX	ak	100	D Thomasville, Ga.	—H. Wimpy
WSA Y	z	100	D Rochester, N. Y.	—Brown Radio Serv.
WSBC	ak	100	4 (25) Chicago, Ill.	—WSBC, Inc.
WSIX	ak	100	Nashville, Tenn.	—WSIX, Inc.
WSNJ	z	100	DP Bridgeton, N. J.	—Eastern States Brcdstg. Corp.
WSOC	ak	100	N (25) Charlotte, N. C.	—WSOC, Inc.
WTAX	ak	100	Springfield, Ill.	—WTAX, Inc.
XEAT	ak	250	Parral, Chih.	—Box 90.
XEE	ak	50	Durango, Dgo.	—Alejandro Stevens, Jr.
XEFV	ak	100	Juarez, Chih.	—Jose Onofre Meza
XETH	ak	100	Puebla, Pue.	—Ramon Huerta G.

1220 keys. (245.8)

CMJE	z	50	Camaguey, Cuba	—Manuel Fernandez Hnos.
KFKU	ak	1000	a (5) Lawrence, Kans.	—University of Kans.
KTMS	z	500	P Santa Barbara, Cal.	—News Press Pub. Co.
KTW	ak	1000	S2 Seattle, Wash.	—First Presb. Church
KWSC	ak	1000	2 (5) Pullman, Wash.	—State College of Wash.
WCAD	ak	500	D Canton, N. Y.	—St. Lawrence University
WCAE	ak	1000	MR (5) Pittsburgh, Pa.	—WCAE, Inc.
WDAE	ak	1000	C (5) Tampa, Fla.	—Tampa Times Co.
WREN	ak	1000	Ba(5) Lawrence, Kans.	—WREN Brcdstg. Co.
XEBL	z	50	Mazatlan, Sin.	—Ignacio L. Saiz
XEDA	z	200	Gra. Anaya, D. F.	—Augusta Garcia Diaz
XETF	ak	30	Veracruz, Ver.	—Jose R. Lopez

1230 keys. (243.8)

KGBX	ak	500	Springfield, Mo.	—Springfield Brcdstg. Co.
KGGM	ak	1000	Albuquerque, N. M.	—N. Mex. Brcdstg. Co.
KYA	ak	1000	(5) San Francisco, Cal.	—Hearst Radio, Inc.
WFBM	ak	1000	C (5) Indianapolis, Ind.	—Ind. Power & Light Co.

NORTH AMERICAN B. C. STATIONS BY FREQUENCIES

WNAC	ak	1000	R (5)	Boston, Mass.	—Yankee Network, Inc.
XEFJ	ak	100		Monterrey, N. L.	—Rodolfo Junco de la Vega

1240 keys. (241.8)

CJCB	ak	1000	F	Sydney, N. S.	—N. Nathanson
CMHB	z	50			—V. E. Weiss y Cia.
KGCU	ak	250	1	Sancti Spiritus, Cuba	—Mandan Radio Ass'n.
KLPM	ak	250	1	Mandan, N. Dak.	—John B. Cooley
KTAT	ak	1000	M	Minot, N. Dak.	—Tarrant Brdcstg. Co.
KTFI	ak	1000		Fort Worth, Texas	—Radio Brdcstg. Corp.
WKAO	ak	1000		Twin Falls, Idaho	—Radio Corp. of P. R.
WXYZ	ak	1000	B	San Juan, P. R.	—King-Trendle Brdcstg. Corp.
XEAY	z	100		Detroit, Mich.	—Fernando Magallanes
XEKL	z	500		Mexico City, D. F.	—Cia. Radio del Bajío
XELA	z	50		Leon, Guan.	—Enrique Gomez
				Saltillo, Coah.	

1250 keys. (239.9)

CMCK	ak	150		Santiago, Cuba	—J. A. Saco
KFOX	ak	1000		Long Beach, Calif.	—Nichols & Warinner, Inc.
WAIR	ak	250	D	Winst.-Salem, N. C.	—Radio Station WAIR
WCAL	ah	1000	2 (2.5)	Northfield, Minn.	—St. Olaf College
WDSU	ak	1000	B	New Orleans, La.	—WDSU, Inc.
WHBI	ak	1000	a (2.5)	Newark, N. J.	—May Radio Brdcstg. Corp.
WLB	ak	1000	2	Minneapolis, Minn.	—University of Minn.
WNWE	ak	1000	a (2.5)	New York, N. Y.	—Wodaam Corp.
WTCN	ak	1000	2B (5)	Minneapolis, Minn.	—Minn. Brdcstg. Corp.
XEXH	z	250		San Luis Pot., S.L.P.	—Ayuntamiento S.L.P.

1260 keys. (238.0)

CMC	z	150		Havana, Cuba	—Del Valle, Valdez y Cia.
KGVO	ak	1000	C	Missoula, Mont.	—Mosby's, Inc.
KHSL	ak	250		Chico, Calif.	—Golden Empire Brdcstg. Co.
KOIL	ak	1000	BM (2.5)	Omaha, Nebr.	—Central States Brdcstg. Co.
KPAG	ak	500	D	Port Arthur, Texas	—Port Arthur College
KRGV	ak	1000	B	Weslaco, Texas	—KRGV, Inc.
KUOA	ak	2500	D	Siloam Spgs., Ark.	—KUOA, Inc.
KVOA	ak	1000		Tucson, Ariz.	—Ariz. Brdcstg. Co., Inc.
WHIO	ak	1000	C (5)	Dayton, Ohio	—Dayton Daily News
WNBX	ak	1000	M	Springfield, Vt.	—WNBX Brdcstg. Corp., 39 Main St.
WTOC	ak	1000	C	Savannah, Ga.	—Savannah Brdcstg. Co.

1270 keys. (236.1)

CMHD	dk	250		Caibarien, Cuba	—Manuel Alvarez M.
KGCA	ak	100	2D	Decorah, Iowa	—Chas. W. Greenley
KOL	ak	1000	C (5)	Seattle, Wash.	—Seattle Brdcstg. Co.
KVOR	ak	1000	C	Colorado Springs, Colo.	—Out West Brdcstg. Co.
KWLC	ak	100	2D	Decorah, Iowa	—Luther College
WASH	ak	500	DaN	Grd. Rpds., Mich.	—King-Trendle Brdcstg. Corp.
WFBR	ak	500	R (1)	Baltimore, Md.	—Balt. Radio Show, Inc.
WIDX	ak	1000	N (2.5)	Jackson, Miss.	—Lamar Life Insurance Co.
WOOD	ak	500	Na	Gd. Rapids, Mich.	—King-Trendle Brdcstg. Corp.
XEXB	ak	50		Jalapa, Ver.	—Gobierno del E. de Ver.

1280 keys. (234.2)

CMCU	ak	500		Havana, Cuba	
CMKO	z			Holguin, Cuba	
KFBB	ak	1000	C (5)	Great Falls, Mont.	—Buttrey Brdcstg. Co., Box 1817
KLS	ak	250		Oakland, Calif.	—Warner Bros.
WCAM	ak	500	1	Camden, N. J.	—City of Camden
WCAP	ak	500	1	Asbury Park, N. J.	—Radio Industries Brdcstg. Co.
WDOD	ak	1000	C (5)	Chattanooga, Tenn.	—WDOD Brdcstg. Corp.
WIBA	ak	1000	N (5)	Madison, Wis.	—Badger Brdcstg. Co.
WORC	ak	500	C	Worcester, Mass.	—Alf. E. Kleindienst
WRR	ak	500	M	Dallas, Texas	—City of Dallas
WTNJ	ak	500	1	Trenton, N. J.	—WOAX, Inc.
XEMX	z	100		Mexico City, D. F.	—Alfonso Traslosheros A.

1290 keys. (232.4)

KDYL	ak	1000	RX	Salt Lake City, Ut.	—Intermountain Brdcstg. Corp.
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NORTH AMERICAN B. C. STATIONS BY FREQUENCIES

KLCN	ak	100	D	Blytheville, Ark.	—C. L. Lintzenich
KTRH	ak	1000	C (5)	Houston, Texas	—KTRH Brdcstg. Co.
WEBC	ak	1000	N (5)	Duluth, Minn.	—Head of the Lakes Brdcstg. Co.
WJAS	ak	1000	C (5)	Pittsburgh, Pa.	—Pitt. Radio Supply House
WNBZ	ak	100	D	Saranac Lake, N. Y.	—Smith & Mace
WNEL	ak	1000	(2.5)	San Juan, P. R.	—Juan Piza, Box 1252

1300 keys. (230.6)

KALE	ak	500	C	Portland, Ore.	—KALE, Inc.
KFAC	ak	1000	C	Los Angeles, Calif.	—L. A. Brdcstg. Co., Inc.
KFH	ak	1000	C (5)	Wichita, Kans.	—Station KFH
WBRR	ak	1000	1	Brooklyn, N. Y.	—People's Pulpit Ass'n.
WEVD	ak	1000	1	New York, N. Y.	—Debs Memorial Radio Fund
WEAB	ak	1000	1	New York, N. Y.	—5th Ave. Brdcstg. Corp.
WFBC	ak	1000	N (5)	Greenville, S. C.	—Greenville News-Piedmont Co.
WHAZ	ak	500	X1	Troy, N. Y.	—Rensselaer Polytechnic Inst.
WHBL	ak	250		Sheboygan, Wis.	—Press Pub. Co.
WIOD	ak	1000	N	Miami, Fla.	—Isle of Dreams Brdcstg. Corp.

1310 keys. (228.9)

CHCK	ak	50		Charlottetown, P.E.I.	—Burke & Gesner.
CJKL	ak	100	F	Kirkland Lake, Ont.	—Northern Brdcstg. Co.
CJLS	ak	100		Yarmouth, N. S.	—Laurie L. Smith
CKCV	ak	100	F	Quebec, P. Q.	—CKCV, Ltd.
KAND	z	100	D	Corsicana, Tex.	—Navarro Brdcstg. Ass'n.
KARM	z	100	P	Fresno, Calif.	—George Harm.
KCKN	ak	100		Kansas City, Kans.	—KCKN Brdcstg. Co.
KCRJ	ak	100	DX	Jerome, Ariz.	—Chas. C. Robinson
KFPL	dk	100	(.25)	Dublin, Texas	—C. C. Baxter, Box 176
KFXR	ak	100	(.25)	Okla. City, Okla.	—Exchange Ave. Bap. Church
KFYO	ak	100	(.25)	Lubbock, Texas	—Plains Radio Brdcstg. Co.
KGEZ	ak	100		Kalispell, Mont.	—Donald C. Treloar
KGEW	ak	100		Kearney, Nebr.	—Cent. Nebr. Brdcstg. Corp.
KHUB	z	270	D	Watsonville, Calif.	—Anna Atkinson
KINY	ak	100		Juneau, Alaska	—Edwin A. Kraft
KPDN	ak	100	XZ (.25)	Yakima, Wash.	—Carl E. Haymond
KRBA	ak	100	D	Pampa, Texas	—R. C. Hoiles
KRMD	ak	100	DP	Lufkin, Texas	—Red Lands Brdcstg. Assn.
KROC	ak	100	(.25)	Shreveport, La.	—KRMD, Inc.
KROA	ak	100	(.25)	Rochester, Minn.	—So. Minn. Brdcstg. Co., Martin Hotel.
KRRA	ak	100		Santa Fe, N. Mex.	—J. Laurance Martin
KRVA	z	250	D	Sherman, Texas	—Red River Valley Brdcstg. Corp.
KSRO	z	250	DP	Santa Rosa, Calif.	—Press-Democrat Pub. Co.
KSUB	z	100	P	Cedar City, Utah	—Johnson & Perry
KTSM	ak	100	(.25)	El Paso, Texas	—Tri-State Brdcstg. Co.
KVOL	ak	100		Lafayette, La.	—Evangeline Brdcstg. Co.
KVOX	z	100	P	Moorhead, Minn.	—Robert K. Herbst
KWOS	z	100	D	Jefferson City, Mo.	—Tribune Ptg. Co.
KXRO	ak	100		Aberdeen, Wash.	—KXRO, Inc.
WAML	ak	100		Laurel, Miss.	—New Laurel Radio Station
WBEO	ak	100	D	Marquette, Mich.	—Lake Superior Brdcstg. Co.
WBOW	ak	100	B (.25)	Terre Haute, Ind.	—Banks of the Wabash, Inc.
WBRE	ak	100		Wilkes-Barre, Pa.	—Louis G. Baltimore
WBRK	z	100	P (.25)	Pittsfield, Mass.	—Harold Thomas.
WCLS	ak	100		Joliet, Ill.	—WCLS, Inc.
WCMI	ak	100	(.25)	Ashland, Ky.	—Ashland Brdcstg. Co.
WDAH	ak	100	S (.25)	El Paso, Texas	—Tri-State Brdcstg. Co.
WEBR	ak	100	B (.25)	Buffalo, N. Y.	—WEBR, Inc.
WEMP	ak	100	D	Milwaukee, Wis.	—Milwaukee Brdcstg. Co.
WEXL	ak	50		Royal Oak, Mich.	—Royal Oak Brdcstg. Co.
WFBG	ak	100	3	Altoona, Pa.	—Gable Brdcstg. Co.
WFDF	ak	100		Flint, Mich.	—Flint Brdcstg. Co.
WGH	ak	100	(.25)	Newport News, Va.	—Hampton Roads Brdcstg. Corp.
WGTM	z	100	DP	Wilson, N. C.	—H. W. Wilson and Ben Farmer
WHAT	ak	100	4	Philadelphia, Pa.	—Independence Brdcstg. Co.
WJAC	ak	100	3 (.25)	Johnstown, Pa.	—WJAC, Inc.
WLAK	z	100		Lakeland, Fla.	—Lake Region Brdcstg. Co.
WLBC	ak	100	(.25)	Muncie, Ind.	—Donald A. Burton
WLNH	ak	100	M	Laconia, N. H.	—Northern Brdcstg. Co.
WMBO	ak	100		Auburn, N. Y.	—WMBO, Inc.
WMFF	ak	100	(.25)	Plattsburg, N. Y.	—Plattsburg Brdcstg. Corp.
WNBH	ak	100	M (.25)	New Bedford, Mass.	—E. Anthony & Sons, Inc.
WOL	ak	100	MXZ	Washington, D. C.	—American Brdcstg. Co.
WRAW	ak	100		Reading, Pa.	—Reading Brdcstg. Co.
WROL	ak	100	B (.25)	Knoxville, Tenn.	—Stuart Brdcstg. Corp.
WSAJ	ak	100		Grove City, Pa.	—Grove City College

NORTH AMERICAN B. C. STATIONS BY FREQUENCIES

WSGN	ak	100	B (25)	Birmingham, Ala.	—Birmingham News Co.
WSJS	ak	100	C	Winston-Salem, N. C.	—Piedmont Pub. Co., 416 N. Marshall.
WTAL	ak	100	.....	Tallahassee, Fla.	—Fla. Capital Brdcasters, Inc.
WTEL	c	100	4	Philadelphia, Pa.	—Foulkrod Radio Eng. Co.
WTJS	ak	100	(25)	Jackson, Tenn.	—Sun Pub. Co., Inc.
WTRC	ak	100	(25)	Elkhart, Ind.	—Trudh Pub. Co., Inc.
XEAG	z	10	.....	Cordoba, Ver.	—Diodora Zuniga
XECW	ak	10	.....	Mexico City, D. F.	—Ma. Elena Bravo de Cordero
XEFW	ak	250	.....	Tampico, Tams.	—Jose Expedito Martinez
XETB	ak	125	.....	Torreón, Coah.	—P. O. Box 225
XEX	ak	125	.....	Monterrey, N. L.	—L. F. Petit Jean.

1320 keys. (227.1)

CMOX	ak	200	.....	Havana, Cuba	.....
KGHF	am	500	B	Pueblo, Colo.	—Curtis P. Ritchie
KGMB	ak	1000	C M	Honolulu, Hawaii	—Honolulu Brdcastg. Co.
KID	ak	500	(1)	Idaho Falls, Idaho	—KID Brdcastg. Co.
KRNT	ak	1000	C (5)	Des Moines, Iowa	—Iowa Brdcastg. Co.
WADC	ak	1000	C	Akron, Ohio	—Allen T. Simmons
WORK	ak	1000	B	York, Pa.	—York Brdcastg. Co.
WSMB	ak	1000	N	New Orleans, La.	—WSMB, Inc.

1330 keys. (225.4)

CMHK	z	250	.....	Cruces, Cuba	—Virgilio Villanueva
KGB	ak	1000	M	San Diego, Calif.	—Don Lee Brdcastg. Sys.
KMO	ak	1000	B ..	Tacoma, Wash.	—KMO, Inc.
KRIS	z	500	B	Corpus Christi, Tex.	—Gulf Coast Brdcastg. Co.
KSCJ	ak	1000	C (5)	Sioux City, Iowa	—Sioux City Journal
WDRC	ak	1000	C (5)	Hartford, Conn.	—WDRC, Inc.
WSAI	ak	1000	MR(2.5)	Cincinnati, Ohio	—Crosley Radio Corp.
WTAQ	ak	1000	C	Green Bay, Wis.	—WHBY, Inc.

1340 keys. (223.7)

CMAB	z	.....	.....	Pinar del Rio, Cuba	—Hotel Ricardo
CMJL	z	75	.....	Camaguey, Cuba	—M. Caymares, Republica 181
KDTH	z	500	DP	Dubuque, Iowa	—Telegraph Herald.
KGDY	ak	250	D	Huron, S. Dak.	—Voice of S. Dak., Inc.
KGIR	ak	1000	N (2.5)	Butte, Mont.	—KGIR, Inc.
KGNO	ak	250	.....	Dodge City, Kans.	—Dodge City Brdcastg. Co.
WCOA	ak	500	CX	Pensacola, Fla.	—Pensacola Brdcastg. Co.
WFEA	ak	500	BM(1)	Manchester, N. H.	—N. H. Brdcastg. Co.
WSPD	ak	1000	B (5)	Toledo, Ohio	—The Fort Industry Co.
XEXD	z	350	.....	Jalapa, Ver.	—Gobierno del E. de Ver.

1350 keys. (222.1)

CMCA	ak	450	.....	Havana, Cuba	—Testar y Gonzales
CMKW	z	.....	.....	Santiago, Cuba	—Reparto Vista Alegre
KIDO	ak	1000	B (2.5)	Boise, Idaho	—Boise Brdcastg. Station
KWK	ak	1000	BM(5)	St. Louis, Mo.	—Thomas Patrick, Inc.
WAWZ	ak	500	1 (1)	Zarephath, N. J.	—Pillar of Fire
WBNX	ak	1000	1	New York, N. Y.	—WBNX Brdcastg. Co.
WMBG	ak	500	R	Richmond, Va.	—Havens & Martin, 914 W. Broad St.

1360 keys. (220.4)

CMJH	dk	50	.....	Ciego de Avila, Cuba	—Luis Marauri H.
KCRC	ak	250	M	Enid, Okla.	—Enid Radiophone Co.
KGER	ak	1000	.....	Long Beach, Calif.	—Consolidated Brdc. Corp.
WCSC	ak	500	N (1)	Charleston, S. C.	—S. C. Brdcastg. Co.
WFBL	ak	1000	C (5)	Syracuse, N. Y.	—Onondaga Radio Brdcastg. Corp.
WGES	ak	500	1 (1)	Chicago, Ill.	—Oak Leaves Brdcastg. Sta.
WQBC	ak	1000	D	Vicksburg, Miss.	—Delta Brdcastg. Co., Inc.
WSBT	ak	500	1	South Bend, Ind.	—South Bend Tribune

1370 keys. (218.8)

CKCW	ak	100	F	Moncton, N. B.	—Moncton Brdcastg. Co.
CMGE	ak	150	.....	Cardenas, Cuba	—Genaro Sebatier
KAST	ak	100	D	Astoria, Ore.	—Astoria Brdcastg. Co.
KCMO	ak	100	.....	Kansas City, Mo.	—KCMO Brdcastg. Co.
KFBN	ak	100	3	Seattle, Wash.	—KVL, Inc., 2101 Smith Tower
KELD	z	100	.....	El Dorado, Ark.	—Radio Enterprises, Inc.
KERN	ak	100	B	Bakersfield, Calif.	—McClatchey Brdcastg. Co.

NORTH AMERICAN B. C. STATIONS BY FREQUENCIES

KFGQ	ak	100	D	Boone, Iowa	—Boone Biblical College
KFJZ	ak	100	(.25)	Fort Worth, Texas	—Ft. Worth Brdcasters, Inc.
KFRQ	ak	250	D	Longview, Texas	—Voice of Longview
KGAR	ak	100	(.25)	Tucson, Arizona	—Tucson Motor Service
KGFL	ak	100	4	Roswell, N. Mex.	—KGFL, Inc.
KGKL	ak	100	(.25)	San Angelo, Texas	—KGKL, Inc.
KICA	ak	100	4	Clovis, N. Mex.	—Western Brdcasters, Inc.
KIUP	ak	100	.....	Durango, Colo.	—San Juan Brdcastg. Co.
KLUF	ak	100	.....	Galveston, Texas	—Geo. R. Clough
KMAC	ak	100	5 (.25)	San Antonio, Tex.	—W. W. McAllister
KOBH	ak	100	.....	Rapid City, S. Dak.	—Black Hills Brdcastg. Co.
KOKO	z	100	.....	La Junta, Colo.	—Southwest Brdcastg. Co.
KONO	ak	100	5	San Antonio, Tex.	—Mission Brdcastg. Co.
KRE	ak	100	(.25)	Berkeley, Calif.	—Cent. Calif. Brdc., Inc.
KRKO	ak	50	3	Everett, Wash.	—Lee Mudgett, 2814 Rucker Ave.
KRMC	z	100	(.25)	Jamestown, N. D.	—Roberts McNab Co.
KSLM	ak	100	.....	Salem, Ore.	—Oregon Radio, Inc.
KTEM	z	250	D	Temple, Texas	—Bell Brdcastg. Co.
KTOK	bk	100	M	Oklahoma City, Ok.	—Okla. Brdcastg. Co.
KUJ	ak	100	.....	Walla Walla, Wash.	—KUJ, Inc.
KVGB	z	100	.....	Great Bend, Kans.	—Ernest Edward Ruehlen
KWYO	ak	100	(.25)	Sheridan, Wyo.	—Big Horn Brdcastg. Co.
WABY	ak	100	B	Albany, N. Y.	—Adirondack Brdcastg. Co.
WAGF	ak	250	D	Dothan, Ala.	—Dothan Brdcastg. Co.
WATL	ak	100	(.25)	Atlanta, Ga.	—Atlanta Brdcastg. Co.
WBLK	ak	100	D	Clarksburg, W. Va.	—The Exponent Corp.
WBNY	ak	100	2 (.25)	Buffalo, N. Y.	—Roy L. Albertson
WBTF	ak	100	(.25)	Danville, Va.	—Piedmont Brdcastg. Corp.
WCBM	ak	100	(.25)	Baltimore, Md.	—Baltimore Brdcastg. Co.
WDAS	ak	100	(.25)	Philadelphia, Pa.	—WDAS Brdcastg. Station, Inc.
WDWS	ak	100	D	Champaign, Ill.	—Champ. News-Gazette, Inc.
WEOA	z	100	C (.25)	Evansville, Ind.	—Evans, on the Air, Inc.
WFOR	ak	100	.....	Hattiesburg, Miss.	—Forrest Brdcastg. Co.
WGL	ak	100	.....	Fort Wayne, Ind.	—Westinghouse Radio Sta., Inc.
WGRC	ak	250	D	New Albany, Ind.	—North Side Brdcastg. Corp.
WHBQ	ak	100	.....	Memphis, Tenn.	—WHBQ, Inc.
WHDF	ak	100	(.25)	Calumet, Mich.	—Upper Mich. Brdcastg. Corp.
WHLB	ak	100	(.25)	Virginia, Minn.	—Head of the Lakes Brdcastg. Co.
WIBM	ak	100	(.25)	Jackson, Mich.	—WIBM, Inc.
WLLH	ak	100	MSy (.25)	Lowell, Mass.	—Merrimac Brdcastg. Co.
WMBR	ak	100	C (.25)	Jacksonville, Fla.	—Fla. Brdcastg. Co.
WMFD	ak	100	D	Wilmington, N. C.	—Richard A. Dunlea
WMFO	ak	100	(.25)	Decatur, Ala.	—James R. Doss, Jr.
WMIN	ak	100	(.25)	St. Paul, Minn.	—WMIN Brdcastg. Co.
WOC	ak	100	C (.25)	Davenport, Iowa	—Tri-City Brdcastg. Co.
WPA Y	ak	100	.....	Portsmouth, Ohio	—Veebee Corp.
WPRA	z	100	(.25) P	Mayaguez, P. R.	—P. R. Advertising Co.
WRAP	ak	100	(.25)	Williamsport, Pa.	—WRAK, Inc.
WRDO	ak	100	M	Augusta, Maine	—WRDO, Inc.
WRJN	ak	100	(.25)	Racine, Wis.	—Racine Brdcastg. Corp.
WSAU	z	100	D	Wausau, Wis.	—Northern Brdcastg. Co.
WSVS	ak	50	2D	Buffalo, N. Y.	—Seneca Voc. High School
XECZ	z	100	.....	San L. Pot., S.L.P.	—Zeferino Z. Jimenez
XEI	ak	125	.....	Morelia, Mich.	—Carlos Gutierrez M.
XELZ	z	100	.....	Mexico City, D. F.	—Aureliano Mirabel
.....	z	10-100	SyP	Lawrence, Mass.	—Merrimac Brdcastg. Co.

1380 kcys. (217.3)

KOH	ak	500	C	Reno, Nevada	—The Bee, Inc.
KQV	ak	500	C1	Pittsburgh, Pa.	—KQV Brdcastg. Co.
WALA	ak	500	C (1)	Mobile, Ala.	—Pape Brdcastg. Co.
WKBH	ak	100	C	La Crosse, Wis.	—WKBH, Inc.
WNBC	ak	250	D	New Britain, Conn.	—State Brdcastg. Corp.
WSMK	ak	200	C 1	Dayton, Ohio	—WSMK, Inc.

1390 kcys. (215.7)

CJGX	ak	100	F	Yorkton, Sask.	—J. Richardson & Sons, Ltd.
CMJC	z	150	.....	Camaguey, Cuba	—Felix Sanchez
KLRA	ak	1000	C (5)	Little Rock, Ark.	—Ark. Brdcastg. Co.
KOY	ak	1000	C	Phoenix, Ariz.	—Salt River Brdcastg. Co.
KRLC	ak	250	.....	Lewiston, Idaho	—H. E. Studebaker
WHK	ak	1000	C (2.5)	Cleveland, Ohio	—Radio Air Corp.
WQDM	dk	1000	D	St. Albans, Vt.	—Regan & Bostwick

NORTH AMERICAN B. C. STATIONS BY FREQUENCIES

1400 keys. (214.2)

CMGC	ad	150	.....	Matanzas, Cuba	--Oscar Mechoso
CKKR	z	100		Santiago, Cuba	--Jaime Nadal
KHBC	ak	250	CM	Hilo, T. H.	--Honolulu Brdcstg. Co., Ltd.
KLO	ak	500	B	Ogden, Utah	--Interstate Brdcstg. Corp.
KTUL	ak	500	C (1)	Tulsa, Okla.	--Tulsa Brdcstg. Co., Inc.
WBBC	ak	500	D (1)	Brooklyn, N. Y.	--Brooklyn Brdcstg. Corp.
WHDL	ak	250	D	Olean, N. Y.	--WHDL, Inc.
WIRE	ak	1000	MR (5)	Indianapolis, Ind.	--Indianapolis Brdcstg., Inc
WVFW	ak	500	2	Brooklyn, N. Y.	--Paramount Brdcstg. Co.

1410 keys. (212.6)

CKFC	ak	50	5	Vancouver, B. C.	--Standard Brdcstg. System, Ltd.
CKMO	ak	100	5F	Vancouver, B. C.	--British Columbia Brdcstg., Ltd.
CMCO	ak	250		Havana, Cuba	--Calle Vista Alegre 90
KFJM	ak	500	(1)	Grand Forks, N. D.	--University of N. Dak.
KGNC	ak	1000	(2.5) B	Amarillo, Texas	--Plains Radio Brdcstg. Co.
KMED	ck	250		Medford, Ore.	--Mrs. W. J. Virgin
WAAB	ak	500	M (1)	Boston, Mass.	--Yankee Network, Inc.
WBCM	ak	500	X	Bay City, Mich.	--James E. Davidson
WHIS	ak	500	(1)	Bluefield, W. Va.	--Daily Telegraph Ptg. Co.
WROK	ak	500	(1)	Rockford, Ill.	--Rockford Broadcasters, Inc.
WSFA	ak	500	C (1)	Montgomery, Ala.	--Montgomery Brdcstg. Co., Inc.

1420 keys. (211.1)

CKGB	ak	100	F	Timmins, Ont.	--Northern Brdcstg. Co., Ltd.
CRCY	ak	100	F	Toronto, Ont.	--Canadian Brdcstg. Corp.
KABC	ak	100	(.25)	San Antonio, Texas	--Alamo Brdcstg. Co., Inc.
KABR	ak	100		Aberdeen, S. D.	--Aberdeen Brdcstg. Co.
KATE	z	250	DP	Albert Lea, Minn.	--Albert Lea Brdcstg. Corp.
KBPS	ak	100	4	Portland, Ore.	--Benham Polytechnic School
KCMC	ak	100	(.25)	Texarkana, Tex.	--KCMC, Inc.
KEUB	ak	100		Price, Utah	--Eastern Utah Brdcstg. Co.
KFAM	z	100	P	St. Cloud, Minn.	--Times Publishing Co.
KFFZ	ak	100		Fond du Lac, Wis.	--Reporter Printing Co.
KGFF	ak	100	(.25) M	Shawnee, Okla.	--KGFF, Inc.
WGCC	ak	100		San Francisco, Cal.	--Golden Gate Brdcstg. Co.
KGIW	ak	100	1	Alamosa, Colo.	--Leonard E. Wilson
KIDW	ak	100	1	Lamar, Colo.	--Southwest Brdcstg. Co.
KIUN	ak	100		Pecos, Texas	--J. H. Hawkins & B. H. Tubbs
KLBM	z	100	(.25) P	La Grande, Ore.	--Harold M. Finley
KNET	z	100	D	Palestine, Texas	--Palestine Brdcstg. Ass'n.
KORE	ak	100		Eugene, Ore.	--Eugene Brdcstg. Station
KRBC	ak	100	(.25)	Abilene, Texas	--Reporter Brdcstg. Co.
KRLH	z	100	D	Midland, Texas	--Clarence Scharbaur
KTRI	z	100	(.25) P	Sioux City, Iowa	--Sioux City Brdcstg. Co.
KUMA	ak	100		Yuma, Ariz.	--Dr. A. H. Schermann
KWBG	ak	100		Hutchinson, Kans.	--W. N. Greenwald
KXL	ak	100	4 (.25)	Portland, Ore.	--KXL Broadcasters
WACO	ak	100	C	Waco, Texas	--KTSA Brdcstg. Co.
WAGM	ak	100		Presque Isle, Me.	--Aroostook Brdcstg. Corp.
WAPQ	ak	100	D	Chattanooga, Tenn.	--W. A. Patterson
WAZL	ak	100	2	Hazleton, Pa.	--Hazleton Brdcstg. Serv., Inc.
WCBS	ak	100		Springfield, Ill.	--WCBS, Inc.
WCHV	ak	100	3 (.25)	Charlottesville, Va.	--Community Brdcstg. Corp.
WEED	ak	100	3 (.25)	Rocky Mount, N. C.	--Wm. Avera Wynne, Box 221
WELL	ak	100		Battle Creek, Mich.	--Enquirer News Co.
WGPC	ak	100		Albany, Ga.	--Americus Brdcstg. Corp.
WHFC	ak	100	(.25)	Cicero, Ill.	--WHFC, Inc., 6138 Cermak Rd.
WILM	aj	100	2	Wilmington, Del.	--Delaware Brdcstg. Corp.
WJBR	z	100	P	Gastonia, N. C.	--J. B. Roberts
WJMS	ak	100		Ironwood, Mich.	--WJMS, Inc., St. James Hotel
WLAP	ak	100	(.25)	Lexington, Ky.	--American Brdcstg. Corp.
WLEU	ak	100	(.25) B	Erie, Pa.	--Leo J. Omelian, Commerce Bldg.
WMAS	ak	100	C (.25)	Springfield, Mass.	--WMAS, Inc., Hotel Stonehaven
WMBC	ak	100	(.25)	Detroit, Mich.	--Michigan Brdcstg. Co.
WMBH	ak	100	(.25)	Joplin, Mo.	--Joplin Brdcstg. Co.
WMBS	z	250	DP	Uniontown, Pa.	--Fayette Brdcstg. Corp.
WMFJ	ak	100		Daytona Beh., Fla.	--W. W. Esch
WMSD	ak	100		Sheffield, Ala.	--Muscle Shoals Brdcstg. Corp.
WNNY	z	100	(.25) P	Watertown, N. Y.	--Black River Valley Broadcasts, Inc.
WPAD	ak	100	(.25)	Paducah, Ky.	--Paducah Brdcstg. Co., Inc.

NORTH AMERICAN B. C. STATIONS BY FREQUENCIES

WPAR	ak	100	C	Parkersburg, W. V.	—Ohio Valley Brcdstg. Corp.
WPRP	z	100	(.25)	Ponce, Puerto Rico	—Julio M. Gonesa
1430 kcys. (209.7) 					
CMJP	ak	75	.....	Moron, Cuba	—Cesar Canall, Callejas 80
KECA	ak	1000	(5) B	Los Angeles, Cal.	—E. C. Anthony, Inc.
KGNF	ak	1000	D	North Platte, Neb.	—Great Plains Brcdstg. Co.
KSO	ak	500	BM(2.5)	Des Moines, Iowa	—Iowa Brcdstg. Co.
WBNS	ak	500	C (1)	Columbus, Ohio	—WBNS, Inc., 33 N. High St.
WHEC	ak	500	C (1)	Rochester, N. Y.	—WHEC, Inc., 40 Franklin St.
WHP	ak	500	C (1)	Harrisburg, Pa.	—WHP, Inc., 216 Locust St.
WMPS	ak	500	(1) B	Memphis, Tenn.	—Memphis Commercial Appeal, Box 445.
WOKO	ak	500	C (1)	Albany, N. Y.	—WOKO, Inc., Hotel Ten Eyck
1440 kcys. (208.2) 					
CMOA	z	150	.....	Havana, Cuba	—Juan Fernandez Duran
KDFN	ak	500	.....	Gasper, Wyo.	—Donald Lewis Hathaway
KFLA	z	500	P	Centralia, Wash.	—Central Brcdstg. Corp.
KXYZ	ak	1000	B	Houston, Texas	—Harris County Brcdstg. Co.
WBIG	ak	1000	C	Greensboro, N. C.	—N. C. Brcdstg. Co., Inc.
WCBA	aj	500	a	Allentown, Pa.	—B. B. Musselman
WMBD	ak	500	C(1)X	Peoria, Ill.	—Peoria Brcdstg. Co.
WSAN	aj	500	Ba	Allentown, Pa.	—WSAN, Inc., 39 Tenth St.
XEFI	ak	250	.....	Chihuahua, Chih.	—Feliciano Lopez Isles
1450 kcys. (206.8) 					
CFCT	ak	50	.....	Victoria, B. C.	—Victoria Brcdstg. Assn.
CHGS	ak	50	F	Summerside, P.E.I.	—R. T. Holman, Ltd.
CMHM	z	100	.....	Cienfuegos, Cuba	—Hotel Union
KGCC	ak	1000	.....	Wolf Point, Mont.	—E. E. Krebsbach
KIEM	ak	500	.....	Eureka, Calif.	—Redwood Brcdstg. Co., Inc.
KTBS	ak	1000	N	Shreveport, La.	—Tri-State Brcdstg. System, Inc.
WAGA	ak	500	B	Atlanta, Ga.	—Liberty Brcdstg. Co.
WGAR	ak	500	MB (1)	Cleveland, Ohio	—WGAR Brcdstg. Co.
WHOM	ak	250	M	Jersey City, N. J.	—New Jersey Brcdstg. Corp.
WSAR	ak	1000	M	Fall River, Mass.	—Doughty & Welch Elec. Co., Inc.
XEF	ak	100	.....	Juarez, Chih.	—Box 70
1460 kcys. (205.4) 					
CMKF	z	250	.....	Holguin, Cuba	—Manuel J. DeGongora
KSTP	ak	10000	R (25)	St. Paul, Minn.	—National Battery Brcdstg. Co.
WJSV	ak	10000	C	Washington, D. C.	—Columbia Brcdstg. System
1470 kcys. (204.0) 					
KGA	ak	5000	B	Spokane, Wash.	—Louis Wasmer
WLAC	ak	5000	C	Nashville, Tenn.	—WLAC, Inc.
1480 kcys. (202.6) 					
KOMA	ak	5000	C	Oklahoma City, Ok.	—Hearst Radio, Inc.
WHIP	z	5000	DP	Hammond, Ind.	—Hammond-Calumet Brcdstg. Corp.
WKBW	ak	5000	C	Buffalo, N. Y.	—Buffalo Brcdstg. Corp.
1490 kcys. (201.2) 					
KFBK	ak	5000	N X	Sacramento, Calif.	—McClatchey Brcdstg. Co., 708 I St.
WCKY	ak	10000	B	Covington, Ky.	—L. B. Wilson, Inc., 6th & Madison.
1500 kcys. (199.9) 					
CJIC	ak	100	.....	S. S. Marie, Ont.	—Hyland & Whitby
KAWM	z	100	.....	Gallup, N. Mex.	—A. W. Mille
KBIX	ak	100	M	Muskogee, Okla.	—Muskogee Press
KBST	z	100	.....	Big Spring, Texas	—Big Spring Herald Brcdstg. Co.
KDAL	ak	100	.....	Duluth, Minn.	—Red River Brcdstg. Co., Inc.
KDB	ak	100	M(.25)	Santa Barbara, Cal.	—Santa Barbara Brcdsters., Ltd.
KGEI	ak	100	N(.25)	Corp. Christi, Tex.	—Eagle Brcdstg. Co., Inc.
KGKB	ak	100	(.25)	Tyler, Texas	—East Texas Brcdstg. Co.
KGKY	ak	100	(.25)	Scottsbluff, Neb.	—Hilliard Co., Inc.

NORTH AMERICAN B. C. STATIONS BY FREQUENCIES

KNEL	ak	250	D	Brady, Texas	—G. L. Burns, Box 1077
KNOW	ak	100	C	Austin, Texas	—KUT Brdcstg. Co.
KOTN	ak	100	D	Pine Bluff, Ark.	—Universal Brdcstg. Corp.
KOVC	ak	100		Valley City, N. D.	—KOVC, Inc.
KPLC	ak	100	(.25)	Lake Charles, La.	—Calcasieu Brdcstg. Co.
KPLT	z	250	D	Paris, Texas	—North Texas Brdcstg. Co.
KPQ	ak	100	(.25)	Wenatchee, Wash.	—Wescoast Brdcstg. Co.
KRNR	ak	100	(.25)	Roseburg, Ore.	—News-Review Co.
KROD	ak	100	P	El Paso, Texas	—Dorrence D. Roderick
KSAL	ak	100	(.25)	Salina, Kans.	—R. J. Laubengayer
KUTA	z	100	P	Salt Lake City, Ut.	—Utah Broadcasting Co.
KVOE	ak	100	M	Santa Ana, Calif.	—Voice of Orange Empire, Ltd.
KXO	ak	100		El Centro, Calif.	—F. M. Bowles, Box 140
WCNW	ak	100	1 (.25)	Brooklyn, N. Y.	—Arthur Faske
WDNC	ak	100	C	Durham, N. C.	—Durham Radio Corp.
WGAL	ak	100	(.25)	Lancaster, Pa.	—WGAL, Inc., 8 W. King St.
WHBB	ak	100		Selma, Ala.	—Selma Brdcstg. Co., Inc.
WHEF	ak	100	(.25)	Kosciusko, Miss.	—Attala Brdcstg. Corp.
WJBK	ak	100	(.25)	Detroit, Mich.	—Jas. F. Hopkins, Inc.
WKAT	z	100	P	Miami Beach, Fla.	—A. Frank Katzentine
WKBB	ak	100	(.25)	E. Dubuque, Ill.	—Sanders Bros., Hotel Julian
WKBV	ak	100	(.25)	Richmond, Ind.	—Knox Radio Corp.
WKBZ	ak	100	(.25)	Muskegon, Mich.	—Karl L. Ashbacher
WKEU	ak	100	D	Griffin, Ga.	—Station WKEU
WMBQ	ak	100	1	Brooklyn, N. Y.	—Metropolitan Brdcstg. Corp.
WMEX	ak	100	(.25)	Boston, Mass.	—The Northern Corp.
WNBF	ak	100	C(.25)	Binghamton, N. Y.	—Howitt-Wood Radio Co.
WNLC	ak	100	DM	New London, Conn.	—Thames Brdcstg. Corp., Mohican Hotel.
WOMI	z	100	P	Owensboro, Ky.	—Owensboro Brdcstg. Co.
WOPI	ak	100		Bristol, Tenn.	—Radiophone Station WOPI
WRDW	ak	100		Augusta, Ga.	—Augusta Brdcstg. Co., Inc.
WRGA	ak	100	(.25)	Rome, Ga.	—Rome Brdcstg. Corp.
WRTD	z	100	B	Richmond, Va.	—Times Dispatch Pub. Co.
WSYB	ak	100		Rutland, Vt.	—Philip Weiss Music Co.
WTMV	ak	100	(.25)	E. St. Louis, Ill.	—Miss. Valley Brdcstg. Co.
WWRL	ak	100	1 (.25)	Woodside, N. Y.	—Long Isl. Brdcstg. Co.
WWSW	ak	100	(.25)	Pittsburgh, Pa.	—Walker & Downing Radio Corp.

1510 kcys. (198.6)

CFRC	ak	100	F	Kingston, Ont.	—Queen's University
CKCR	ak	100		Waterloo, Ont.	—K. W. Brdcstg. Co.

1530 kcys. (196.0)

KXBY	ak	1000	.....	Kansas City, Mo.	—First Natl. Television Inc.
WBRV	ak	1000	M	Waterbury, Conn.	—American Republican, Inc.

1550 kcys. (193.4)

KPMC	ak	1000	M	Bakersfield, Calif.	—Pioneer Mercantile Co.
WQXR	ak	1000		New York, N. Y.	—Interstate Brdcstg. Co.

NORTH AMERICAN B. C. STATIONS BY LOCATIONS

Frequency in kilocycles in second column. Night power in watts in third column. Net work affiliations in fourth column. C Columbia, R National Red, B National Blue, N National Red and Blue. F Canadian, M Mutual.

ALABAMA	Montgomery	Ketchikan	Yuma
Birmingham	WSFA 1410 500 C	KGBU 900 500	KUMA 1420 100
WAPI 1140 5000 N	Selma	ARIZONA	
WBRC 930 1000 C	WHBB 1500 100	Jerome	Blytheville
WSGN 1310 100 B	Sheffield	KCRJ 1310 100	KLCN 1290 100
Decatur	WMSD 1420 100	Lowell	El Dorado
WMFO 1370 100	Tuscaloosa	KSUN 1200 100	KELD 1370 100
Dothan	WJRD 1200 100	Phoenix	Fort Smith
WAGF 1370 250	ALASKA		
Gadsden	Anchorage	KOY 1390 1000 C	KFPW 1210 100
WJBY 1210 100	KFQD 780 250	KTAR 620 1000 N	Hot Springs
Huntsville	Juneau	Tucson	KTHS 1060 10000 N
WBHP 1200 100	KINY 1310 100	KGAR 1370 100	Jonesboro
Mobile		KVOA 1260 1000	KBTM 1200 100
WALA 1380 500 C			

NORTH AMERICAN B. C. STATIONS BY LOCATIONS

<p>Little Rock KARK 890 500 B KGGH 1200 100 KLRA 1390 1000 C</p> <p>Pine Bluff KOTN 1500 100</p> <p>Siloam Springs KUOA 1260 250</p> <hr/> <p style="text-align: center;">CALIFORNIA</p> <hr/> <p>Bakersfield KERN 1370 100 B KPMC 1550 1000M</p> <p>Berkeley KRE 1370 100</p> <p>Beverly Hills KMPC 710 500</p> <p>Chico KHSL 1260 250</p> <p>El Centro KXO 1500 100</p> <p>Eureka KIEM 1450 500</p> <p>Fresno KARM 1310 100 KMJ 580 1000 N</p> <p>Glendale KIEV 850 250</p> <p>Hollywood KFWB 950 1000</p> <p>Long Beach KFOX 1250 1000 KGER 1360 1000</p> <p>Los Angeles KECA 1430 1000 B KEHE 780 1000 KFAC 1300 1000 KFI 640 50000 R KFSG 1120 500 KFVD 1000 1000 KGFJ 1200 100 KHJ 900 1000M KMTR 570 1000 KNX 1050 50000 C KRKD 1120 500</p> <p>Merced KYOS 1040 250</p> <p>Modesto KTRB 740 250</p> <p>Monterrey KDON 1210 100M</p> <p>Oakland KLS 1280 250 KLX 880 1000 KROW 930 1000</p> <p>Pasadena KPPC 1210 100</p> <p>Redding KVCV 1200 100</p> <p>Sacramento KFBK 1490 5000 N KROY 1210 100</p> <p>San Bernardino KFXM 1210 100M</p> <p>San Diego KFSD 600 1000 B KGB 1330 1000M</p> <p>San Francisco KFRK 610 1000M KGGC 1420 100 KGO 790 7500 B KJBS 1070 500 KPO 680 50000 R KSFO 560 1000 C KYA 1230 1000</p> <p>San Jose KQW 1010 1000M</p>	<p>San Luis Obispo KVEE 1200 250</p> <p>Santa Ana KVOE 1500 100M</p> <p>Santa Barbara KDB 1500 100M KTMS 1220 500</p> <p>Santa Rosa KSRO 1310 250</p> <p>Stockton KGDM 1100 1000M KWG 1200 100 N</p> <p>Visalia KTKK 1190 250</p> <p>Watsonville KHUB 1310 250</p> <hr/> <p style="text-align: center;">COLORADO</p> <hr/> <p>Alamosa KGIW 1420 100</p> <p>Colorado Springs KVOR 1270 1000 C</p> <p>Denver KFEL 920 500M KLZ 560 1000 C KOA 830 50000 N KPOF 880 5000 KVOD 920 500 B</p> <p>Durango KIUP 1370 100</p> <p>Grand Junction KFXJ 1200 100</p> <p>Greeley KFKA 880 500M</p> <p>La Junta KOKO 1370 100</p> <p>Lamar KIDW 1420 100</p> <p>Pueblo KGHF 1320 500 B</p> <p>Sterling KGEK 1200 100</p> <hr/> <p style="text-align: center;">CONNECTICUT</p> <hr/> <p>Bridgeport WICC 600 500M</p> <p>Hartford WDRC 1330 1000 C WTIC 1040 50000 R WTHI 1200 100M</p> <p>New Britain WNBC 1380 250</p> <p>New Haven WELI 900 500</p> <p>New London WNLC 1500 100M</p> <p>Waterbury WATR 1190 100 WBRY 1530 1000M</p> <hr/> <p style="text-align: center;">DELAWARE</p> <hr/> <p>Wilmington WDEL 1120 250 R WILM 1420 100</p> <hr/> <p style="text-align: center;">DISTRICT OF COLUMBIA</p> <hr/> <p>Washington WJWS 1460 10000 C WMAL 630 250 B WOL 1310 100M WRC 950 500 R</p>	<p style="text-align: center;">FLORIDA</p> <hr/> <p>Clearwater WFLA 620 1000 N</p> <p>Daytona Beach WMFJ 1420 100</p> <p>Gainesville WRUF 830 5000</p> <p>Jacksonville WJAX 900 1000 N WMBR 1370 100 C</p> <p>Lakeland WLAK 1310 100</p> <p>Miami WIOD 1300 1000 N WQAM 560 1000 C</p> <p>Miami Beach WKAT 1500 100</p> <p>Orlando WDBO 580 1000 C</p> <p>Pensacola WCOA 1340 500 C</p> <p>St. Augustine WFOY 1210 100</p> <p>St. Petersburg WSUN 620 1000 N</p> <p>Tallahassee WTAL 1310 100</p> <p>Tampa WDAE 1220 1000 C West Palm Beach WJNO 1200 100 C</p> <hr/> <p style="text-align: center;">GEORGIA</p> <hr/> <p>Albany WGPC 1420 100</p> <p>Atlanta WAGA 1450 500 WATL 1370 100 WGST 890 1000 C WSB 740 50000 N</p> <p>Augusta WRDW 1500 100</p> <p>Columbus WRBL 1200 100</p> <p>Griffin WKEU 1500 100</p> <p>Macon WMAZ 1180 1000 C</p> <p>Rome WRGA 1500 100</p> <p>Savannah WTOC 1260 1000 C</p> <p>Thomasville WPAX 1210 100</p> <p>Waycross WAYX 1200 100</p> <hr/> <p style="text-align: center;">HAWAII</p> <hr/> <p>Hilo KHBC 1400 250M</p> <p>Honolulu KGMB 1320 1000 C KGU 750 2500 N</p> <hr/> <p style="text-align: center;">IDAHO</p> <hr/> <p>Boise KIDO 1350 1000 B</p> <p>Idaho Falls KID 1320 500</p> <p>Lewiston KRLC 1390 250</p>	<p>Nampa KFXX 1200 100</p> <p>Pocatello KSEI 900 250</p> <p>Twin Falls KTFI 1240 1000</p> <hr/> <p style="text-align: center;">ILLINOIS</p> <hr/> <p>Bloomington WJBC 1200 100</p> <p>Carthage WCAZ 1070 100</p> <p>Champaign WDWS 1370 100</p> <p>Chicago WAAF 920 1000 WBBM 770 50000 C WCBF 1080 5000 WCFL 970 5000 B WCRW 1210 100 WEDC 1210 100 WENR 870 50000 B WGES 1360 500 WGN 720 50000M WJJD 1130 20000 WLS 870 50000 N WMAQ 670 50000 R WMBI 1080 5000 WSBC 1210 100</p> <p>Cicero WHFC 1420 100</p> <p>Decatur WJBL 1200 100</p> <p>East Dubuque WKBB 1500 100</p> <p>East St. Louis WTMV 1500 100</p> <p>Harrisburg WEBQ 1210 100</p> <p>Joliet WCLS 1310 100</p> <p>Peoria WMBD 1440 500 C</p> <p>Quincy WTAD 900 1000</p> <p>Rockford WROK 1410 500</p> <p>Rock Island WHBF 1210 100</p> <p>Springfield WCBS 1420 100 WTAX 1210 100</p> <p>Tuscola WDZ 1020 250</p> <p>Urbana WILL 580 1000</p> <hr/> <p style="text-align: center;">INDIANA</p> <hr/> <p>Anderson WHBU 1210 100</p> <p>Elkhart WTRC 1310 100</p> <p>Evansville WEOA 1370 100 C WGBF 630 500 B</p> <p>Fort Wayne WGL 1370 100 WOWO 1160 10000 B</p> <p>Gary WIND 560 1000</p> <p>Hammond WHIP 1480 5000 WWAE 1200 100</p>
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NORTH AMERICAN B. C. STATIONS BY LOCATIONS

<p>Indianapolis WFBI 1230 1000 C WGVA 1050 1000 WIRE 1400 1000 R</p> <p>Muncie WLBC 1310 100 New Albany WGRC 1370 250 Richmond WKBY 1500 100 South Bend WFAM 1200 100 WSBT 1360 500 Terre Haute WBOW 1310 100 B West Lafayette WBAA 890 500</p> <hr/> <p style="text-align: center;">IOWA</p> <hr/> <p>Ames WOI 640 5000</p> <p>Boone KFGO 1370 100 Cedar Rapids WMT 600 1000 B</p> <p>Davenport WOC 1370 100 C</p> <p>Decorah KGCA 1270 100 KWLC 1270 100</p> <p>Des Moines KRNT 1320 1000 C KSO 1430 500 B WHO 1000 5000 R</p> <p>Dubuque KDTH 1340 500</p> <p>Iowa City WSUI 880 500</p> <p>Marshalltown KFJB 1200 100</p> <p>Mason City KGLO 1210 100 C</p> <p>Shenandoah KFNF 890 500 KMA 930 1000</p> <p>Sioux City KSCJ 1330 1000 C KTRI 1420 100</p> <hr/> <p style="text-align: center;">KANSAS</p> <hr/> <p>Abilene KFBI 1050 5000</p> <p>Coffeyville KGGF 1010 1000</p> <p>Dodge City KGNO 1340 250</p> <p>Garden City KIUL 1210 100</p> <p>Great Bend KVGB 1370 100</p> <p>Hutchinson KWBG 1420 100</p> <p>Kansas City KCKN 1310 100</p> <p>Lawrence KFku 1220 1000 WREN 1220 1000 B</p> <p>Manhattan KSAC 580 500</p> <p>Pittsburg KOAM 790 1000</p> <p>Salina KSAL 1500 100</p> <p>Topeka WIBW 580 1000 C</p>	<p>Wichita KANS 1210 100 B KFHI 1300 1000 C</p> <hr/> <p style="text-align: center;">KENTUCKY</p> <hr/> <p>Ashland WCMI 1310 100</p> <p>Covington WCKY 1490 10000 B</p> <p>Lexington WLAP 1420 100</p> <p>Louisville WAVE 940 1000 N WHAS 820 50000 C</p> <p>Middlesboro WLMU 1210 100</p> <p>Owensboro WOMI 1500 100</p> <p>Paducah WPAD 1420 100</p> <hr/> <p style="text-align: center;">LOUISIANA</p> <hr/> <p>Alexandria KALB 1210 100</p> <p>Baton Rouge WJBO 1120 500 B</p> <p>Lafayette KVOL 1310 100</p> <p>Lake Charles KPLC 1500 100</p> <p>Monroe KMLB 1200 100</p> <p>New Orleans WBNO 1200 100 WBSU 1250 1000 B WJBW 1200 100 WSMB 1320 1000 N WWL 850 10000 C</p> <p>Shreveport KRMD 1310 100 KTBS 1450 1000 N KWKH 1100 10000 C</p> <hr/> <p style="text-align: center;">MAINE</p> <hr/> <p>Augusta WRDO 1370 100M</p> <p>Bangor WABI 1200 100 WLBS 620 500 C</p> <p>Portland WCSH 940 1000 R WGAN 640 500</p> <p>Presque Isle WAGM 1420 100</p> <hr/> <p style="text-align: center;">MARYLAND</p> <hr/> <p>Baltimore WBAL 760 2500 B WBAL 1060 10000 B</p> <p>WCAO 600 500 C</p> <p>WCBM 1370 100</p> <p>WFBR 1270 500 R</p> <p>College Park W3XJ 1060 100</p> <p>Cumberland WTBO 800 250</p> <p>Frederick WFMD 900 500</p> <p>Hagerstown WJEJ 1210 100</p> <p>Salisbury WSAL 1200 250</p>	<p style="text-align: center;">MASSACHUSETTS</p> <hr/> <p>Boston WAAB 1410 500M WABZ 990 50000 B WCOP 1120 500 WEI 590 1000 C WHDH 830 1000 WMEX 1500 100 WNAC 1230 1000 R WORL 920 500</p> <p>Fall River WSAR 1450 1000M</p> <p>Lawrence WLAW 680 1000 1370 10-100</p> <p>Lowell WLLH 1370 100M</p> <p>New Bedford WNBH 1310 100M</p> <p>Pittsfield WBRK 1310 100</p> <p>Springfield WBZA 990 1000 B WMAS 1420 100 C WSPR 1140 500M</p> <p>Worcester WORC 1280 500 C WTAG 580 1000 R</p> <hr/> <p style="text-align: center;">MICHIGAN</p> <hr/> <p>Battle Creek WELL 1420 100</p> <p>Bay City WBCM 1410 500</p> <p>Calumet WHDF 1370 100</p> <p>Detroit WJBK 1500 100 WJR 750 50000 C WMBC 1420 100 WWJ 920 5000 R WXYZ 1240 1000 B</p> <p>East Lansing WKAR 850 1000</p> <p>Flint WFDL 1310 100</p> <p>Grand Rapids WASH 1270 500 N WOOD 1270 500 N</p> <p>Ironwood WJMS 1420 100</p> <p>Jackson WIBM 1370 100</p> <p>Kalamazoo WKZO 590 1000 B</p> <p>Lansing WJIM 1210 100</p> <p>Lapeer WMPG 1200 100</p> <p>Marquette WBEO 1310 100</p> <p>Muskegon WKBY 1500 100</p> <p>Royal Oak WEXL 1310 50</p> <p>Saginaw WHAL 950 500</p> <hr/> <p style="text-align: center;">MINNESOTA</p> <hr/> <p>Albert Lea KATE 1420 250</p> <p>Duluth KDAL 1500 100 WEBC 1290 1000 N</p>	<p>Fergus Falls KGDE 1200 100</p> <p>Hibbing WMFG 1210 100</p> <p>Minneapolis WCCO 810 50000 C WDCY 1180 1000 WLB 1250 1000 WTCN 1250 1000 B</p> <p>Moorhead KVOX 1310 100</p> <p>Northfield WCAL 1250 1000</p> <p>Rochester KROC 1310 100</p> <p>St. Cloud KEAM 1420 100</p> <p>St. Paul KSTP 1460 10000 R WMIN 1370 100</p> <p>Virginia WHLB 1370 100</p> <p>Winona KWNO 1200 100</p> <hr/> <p style="text-align: center;">MISSISSIPPI</p> <hr/> <p>Grenada WMFN 1210 100</p> <p>Gulfport WGMG 1210 100</p> <p>Hattiesburg WFOR 1370 100</p> <p>Jackson WJDX 1270 1000 N</p> <p>Kosciusko WHEF 1500 100</p> <p>Laurel WAML 1310 100</p> <p>Meridian WCOC 880 500 C</p> <p>Vicksburg WQBC 1360 1000</p> <hr/> <p style="text-align: center;">MISSOURI</p> <hr/> <p>Cape Girardeau KFVS 1210 100</p> <p>Columbia KFRU 630 500</p> <p>Jefferson City KWOS 1310 100</p> <p>Joplin WMBH 1420 100</p> <p>Kansas City KCMO 1370 100 KMBC 950 1000 C KXBY 1530 1000 WDAF 610 1000 R WHB 860 1000M</p> <p>St. Joseph KFEQ 680 2500</p> <p>St. Louis KFuo 550 500 KMOX 1090 50000 C KSD 550 1000 R KWK 1350 1000 B WEW 760 1000 WIL 1200 100</p> <p>Springfield KGBW 1230 500 KWTO 560 5000</p> <hr/> <p style="text-align: center;">MONTANA</p> <hr/> <p>Billings KGHL 780 1000 N</p>
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NORTH AMERICAN B. C. STATIONS BY LOCATIONS

Butte KGIR 1340 1000 N Great Falls KFBB 1280 1000 C Helena KPFA 1210 100 Kallispell KGEZ 1310 100 Lewistown KDNC 1200 100 Missoula KGVO 1260 1000 C Wolf Point KGCX 1450 1000	Carlsbad KLAH 1210 100 Clovis KICA 1370 100 Gallup KAWM 1500 100 Roswell KGFL 1370 100 Santa Fe KRQA 1310 100	Utica WIBX 1200 100 C Watertown WNNY 1420 100 White Plains WFAS 1210 100 Woodside WWRL 1500 100	Columbus WBNS 1430 500 C WCOL 1210 100 N WHKC 640 500 WOSU 570 750 Dayton WHIO 1260 1000 C WSMK 1380 200 C Lima WBLY 1210 100 Portsmouth WPAY 1370 100 Toledo WSPD 1340 1000 B WTOL 1200 100 Youngstown WKBN 570 500 C Zanesville WALR 1210 100
NEBRASKA Clay Center KMMJ 740 1000 Kearney KGFV 1310 100 Lincoln KFAB 770 10000 C KFOR 1210 100 C Norfolk WJAG 1060 1000 North Platte KGNF 1430 1000 Omaha KOIL 1260 1000 B WAAW 660 500 WOW 590 1000 R Scottsbluff KGGY 1500 100	NEW YORK Albany WABY 1370 100 WOKO 1430 500 C Auburn WMB0 1310 100 Binghamton WNBF 1500 100 C Brooklyn WBBC 1400 500 WBBR 1300 1000 WCNW 1500 100 WMB0 1500 100 WFFW 1400 500 Buffalo WBEN 900 1000 R WBNY 1370 100 WBRB 1310 100 B WGR 550 1000 C WKBW 1480 5000 C WSVS 1370 50 Canton WCAD 1220 500 Elmira WESG 850 1000 C Freeport WGBB 1210 100 Jamestown WJTN 1210 100 B Newburgh WCNY 1210 100 New York WABC 860 50000 C WBIL 1100 5000 WBNX 1350 1000 WBOQ 860 50000 WEAF 660 50000 R WEVD 1300 1000 WFAB 1300 1000 WFHN 1010 1000 WINS 1180 1000 WJZ 760 50000 B WMCA 570 1000 WNEW 1250 1000 WNYC 810 1000 WOV 1130 1000 WOXR 1550 1000 Olean WHDL 1400 250 Plattsburg WMPF 1310 100 Rochester WHAM 1150 50000 B WHFC 1430 500 C WSAY 1210 100 Saranac Lake WNBZ 1290 100 Schenectady WGY 790 50000 R Syracuse WFBL 1360 1000 C WSYR 570 1000 B Troy WHAZ 1300 500	NORTH CAROLINA Asheville WWNC 570 1000 N Charlotte WBT 1680 50000 C WSOC 1210 100 N Durham WDNC 1500 100 C Gastonia WJBR 1420 100 Greensboro WBG 1440 1000 C High Point WMFR 1200 100 Kinston WFTC 1200 100 Raleigh WPTF 680 1000 N Rocky Mount WEED 1420 100 Wilmington WMFD 1370 100 Wilson WGTW 1310 100 Winston-Salem WAIR 1250 250 WSJS 1310 100 C	OKLAHOMA Ada KADA 1200 100M Ardmore KVS0 1210 100M Elk City KASA 1210 100M Enid KCRC 1360 250M Muskogee KBIX 1500 100M Norman WNAD 1010 1000 Oklahoma City KFXR 1310 100 KOMA 1480 5000 C KTOK 1370 190M WKY 900 1000 N Okmulgee KHBG 1210 100 Ponca City WBBZ 1200 100M Shawnee KGFV 1420 100M Tulsa KTUL 1400 500 C KVOO 1140 25000 N
NEVADA Reno KOH 1380 500 C		NORTH DAKOTA Bismarck KFYR 550 1000 N Devils Lake KDLR 1210 100 Fargo WDAY 940 1000 N Grand Forks KFJM 1410 500 Jamestown KRMC 1370 100 Mandan KGGC 1240 250 Minot KLPM 1240 250 Valley City KOVc 1500 100	OREGON Astoria KAST 1370 100 Corvallis KOAC 550 1000 Eugene KORE 1420 100 Klamath Falls KFJI 1210 100 La Grande KLBW 1420 100 Marshfield KOOS 1200 100 Medford KMED 1410 250 Portland KALE 1300 500 C KBPS 1420 100 KEX 1180 5000 B KGW 620 1000 R KOIN 940 1000 C KWJJ 1040 500 KXL 1420 100 Roseburg KRNR 1500 100 Salem KSLM 1370 100
NEW HAMPSHIRE Laconia WLNH 1310 100M Manchester WFEA 1340 500 B Portsmouth WHEB 740 250			
NEW JERSEY Asbury Park WCAP 1280 500 Atlantic City WFG 1100 5000 C Bridgeton WSNJ 1210 100 Camden WCAM 1280 500 Jersey City WAAT 940 500 WHOM 1450 250 Newark WHBI 1250 1000 WOR 710 50000M Red Bank WBRB 1210 100 Trenton WTNJ 1280 500 Zarephath WAWZ 1350 500			
NEW MEXICO Albuquerque KGGM 1230 1000 KOB 1180 10000 B			

NORTH AMERICAN B. C. STATIONS BY LOCATIONS

PENNSYLVANIA	SOUTH CAROLINA	Corpus Christi	Price	
Allentown	Anderson	KGFI 1500 100	KEUB 1420 100	
WCBA 1440 500	WAIM 1200 100 C	KRIS 1330 500 B	Salt Lake City	
WSAN 1440 500 B	Charleston	Corsicana		
Altoona	WCSC 1360 500 N	KAND 1310 100	KDYL 1290 1000 R	
WFBG 1310 100	Columbia	Dallas		
Easton	WIS 560 1000 N	KRLD 1040 10000 C	KSL 1130 50000 C	
WEST 1200 100	Florence	WFAA 800 50000 N	KUTA 1500 100	
Erie	WOLS 1200 100	WRR 1280 500M	VERMONT	
WLEU 1420 100 B	Greenville	Dublin	Burlington	
Glenside	WFBC 1300 1000 N	KFPL 1310 100	WCAX 1200 100	
WIBG 970 100	Spartanburg	El Paso	Rutland	
Greensburg	WSPA 920 1000	KROD 1500 100	WSYB 1500 100	
WHJB 620 250 C	SOUTH DAKOTA		St. Albans	
Grove City	Aberdeen	KTSM 1310 100	WQDM 1390 1000	
WSAJ 1310 100	KABR 1420 100	WDAH 1310 100	Springfield	
Harrisburg	Brookings	Fort Worth	WNBX 1260 1000M	
WHP 1430 500 C	KFDY 780 1000	KFJZ 1370 100	Waterbury	
WKBO 1200 100	Huron	KTAT 1240 1000M	WDEV 550 500	
Hazleton	KG DY 1340 250	WBAP 800 50000 N	VIRGINIA	
WAZL 1420 100	Pierre	Galveston	Charlottesville	
Johnstown	KGFX 630 200	KLUF 1370 100	WCHV 1420 100	
WJAC 1310 100	Rapid City	Greenville	Danville	
Lancaster	KOBH 1370 100	KGVL 1200 100	WBTM 1370 100	
WGAL 1500 100	WCAT 1200 100	Houston	Harrisonburg	
Philadelphia	KOBS 1370 100	KPRC 920 1000 N	WSVA 550 500	
KYW 1020 10000 R	KELO 1200 100	KTRH 1290 1000 C	Lynchburg	
WCAU 1170 50000 C	KSOO 1110 2500 B	KXYZ 1440 1000 B	WLVA 1200 100	
WDAS 1370 100	Vermillion	Kilgore	Newport News	
WFIL 560 1000 B	KUSD 890 500	KOQA 1210 100	WGH 1310 100	
WHAT 1310 100	Watertown	Longview	Norfolk	
WIP 610 1000	KWTN 1210 100	KFRD 1370 250	WTAR 780 1000 N	
WPN 920 1000	Yankton	Lubbock	Richmond	
WRAX 920 1000	WNAX 570 1000 C	KFYO 1310 100	WBBL 1210 100	
WTEL 1310 100	TENNESSEE		WMBG 1350 500 R	
Pittsburgh	Bristol	KRLH 1420 100	WRNL 880 500	
KDKA 980 50000 B	WOPI 1500 100	Palestine	WRTD 1500 100 B	
KOV 1380 500 C	Chattanooga	KNET 1420 100	WRVA 1110 5000 C	
WCAE 1220 1000 R	WAPO 1420 100	Pampa	Roanoke	
WJAS 1290 1000 C	WDOD 1280 1000 C	KPDN 1310 100	WDBJ 930 1000 C	
WWSW 1500 100	Jackson	Paris	WASHINGTON	
Reading	WTJS 1310 100	KPLT 1500 250	Aberdeen	
WEEU 830 1000	Knoxville	Pecos	KXRO 1310 100	
WRAW 1310 100	WNOX 1010 1000 C	KIUN 1420 100	Bellingham	
Scranton	WROL 1310 100 B	Port Arthur	KVOS 1200 100	
WGBI 880 500	Memphis	KPAC 1260 500	Centralia	
WQAN 880 500	WHBO 1370 100	San Angelo	KELA 1440 500	
Sunbury	WMC 780 1000 N	KGKL 1370 100	Everett	
WKOK 1210 100	WMPS 1430 500 B	San Antonio	KRKO 1370 50	
Uniontown	WREC 600 1000 C	KABC 1420 100	Olympia	
WBMS 1420 250	Nashville	KMAC 1370 100	KG Y 1210 100	
Wilkes-Barre	WLAC 1470 5000 C	KONO 1370 100	Pullman	
WBAX 1210 100	WSIX 1210 100	KTSA 550 1000 C	KWSC 1220 1000	
WBRE 1310 100	WSM 650 50000 N	WOAI 1190 50000 N	Seattle	
Williamsport	TEXAS		KEEN 1370 100	
WRAK 1370 100	Abilene	KRRV 1310 250	KIRO 710 1000	
York	KRBC 1420 100	Temple	KJR 970 5000 B	
WORK 1320 1000 B	Amarillo	KTEM 1370 250	KOL 1270 1000 C	
PUERTO RICO		Texaskana	KOMO 920 1000 R	
Mayaguez	KGNC 1410 1000 B	KCMC 1420 100	KRSC 1120 250	
WRA 1370 100	Austin	Tyler	KTW 1220 1000	
Ponce	KNOW 1500 100 C	KGKB 1500 100	KXA 760 250	
WPRP 1420 100	KTBC 1120 1000	Waco	Spokane	
San Juan	Beaumont	WACO 1420 100 C	KFIO 1120 100	
WKAQ 1240 1000	KFDM 560 500 B	Wealaco	KFPY 890 1000 C	
WNEL 1290 1000	Big Spring	Wichita Falls	KGA 1470 5000 B	
RHODE ISLAND		KGKO 570 250 C	KHQ 590 1000 R	
Providence	KBST 1500 100	UTAH		
WEAN 780 1000M	Brady	Cedar City	Tacoma	
WJAR 890 1000 R	KNEL 1500 250	KSUB 1310 100	KMO 1330 1000	
WPRO 630 500 C	College Station	Ogden	KVI 570 1000 C	
	WTAW 1120 500	KLO 1400 500 B	Walla Walla	
			KUJ 1370 100	

NORTH AMERICAN B. C. STATIONS BY LOCATIONS

Wenatchee KPO 1500 100	Lethbridge CJOC 950 100 F	London CFPL 730 100 F	NEWFOUNDLAND
Yakima KIT 1310 100	BRIT. COLUMBIA	North Bay CFCH 930 100 F	St. John's VOAC 1065 40
WEST VIRGINIA	Chilliwack CHWK 780 100 F	Ottawa CKCO 1010 100 F	VOAS 940 100
Bluefield WHIS 1410 500	Kamloops CFJC 880 100 F	Prescott CFLC 930 100	VOCM 1006 200
Charleston WCHS 580 500 C	Kelowna CKOV 630 100 F	St. Catharines CKTB 1200 100 F	VOGY 840 400
Clarksburg WBLK 1370 100	Prince Rupert CFPR 580 50	Sault Ste. Marie CHC 1500 100	VONF 1195 500
Fairmont WMMN 890 500 C	Trail CJAT 910 1000 F	Stratford CJCS 1210 50	VOWR 681 500
Huntington WSAZ 1190 1000	Vancouver CJOR 600 500	Sudbury CKSO 780 1000 F	MEXICO
Parkersburg WPAR 1420 100 C	CKCD 1010 100	Timmins CKGB 1420 100 F	AGUASCALIENTES
Wheeling WWVA 1160 5000 C	CKKW 1410 50	Toronto CFRB 690 10000 C	Aguascalientes
WISCONSIN	CKMO 1410 100 F	GRCL 580 100 F	XEBI 1000 25
Eau Claire WEAU 1050 1000	CKWX 1010 100 F	GRCT 840 5000 N	XEXC 810 350
Fond du Lac KFIZ 1420 100	CRCV 1100 5000 F	CRCY 1420 100 F	BAJA CALIFORNIA
Green Bay WBZY 1200 100	Victoria CFCT 1450 50	Waterloo CKCR 1510 100	Mexicali
WTAQ 1330 1000 C	MANITOBA	Windsor CKLW 1030 5000M	XEAA 920 200
Janesville WCLO 1200 100	Brandon CKX 1120 1000 F	CRCW 600 500 F	XEAO 660 250
LaCrosse WKBH 1380 1000 C	Winnipeg CJRW 630 500 F	Wingham CKNX 1200 50	Tijuana
Madison WHA 940 5000	WKY 910 15000 F	PRINCE EDWARD ISLAND	XEAC 980 250
WIBA 1280 1000 N	NEW BRUNSWICK	Charlottetown CFCY 630 1000 F	XEBG 820 1000
Manitowoc WOMT 1210 100	Fredericton CFNB 550 500 F	CHCK 1310 50	XEC 1150 100
Milwaukee WEMP 1310 100	Moncton CKCW 1370 100 F	Summerside CHGS 1450 50 F	XELO 1110 50000
WISN 1120 250 C	St. John CHSJ 1120 500 F	QUEBEC	XEMO 860 5000
WTMJ 620 1000 N	N. W. TERRITORY	Chicoutimi CRCS 950 100 F	XEOK 760 2500
Poynette WIBU 1210 100	Aklavik CJCU 1210 50	Hull CKCH 1210 100 F	CHIHUAHUA
Racine WRJN 1370 100	NOVA SCOTIA	Montreal CFCH 600 500 N	Chihuahua
Sheboygan WHBL 1300 250	Glace Bay VAS 685 2000	CHLP 1120 100 F	XEFI 1440 250
Stevens Point WLBL 900 2500	Halifax CHNS 930 1000 F	CKAK 730 5000 C	Juarez XEFV 1210 100
Superior WDSM 1200 100	Sydney CJCB 1240 1000 F	CRCM 910 5000 F	XEF 1450 100
Wausau WSAU 1370 100	Wolfville CKIC 1010 50	New Carlisle CHNC 960 1000 F	XEJ 1020 1000
WYOMING	Yarmouth CJLS 1310 100	Quebec CHRC 580 100	XEP 1160 500
Casper KDFN 1440 500	ONTARIO	CKCV 1310 100 F	Parral XEAT 1210 250
Sheridan KWYO 1370 100	Brantford CKPC 930 100 F	CRCK 1050 1000 F	COAHUILA
CANADA	Chatham CFCO 630 100 F	Sherbrooke CHLT 1210 100	Piedras Negras XEPN 730 100000
ALBERTA	Cobalt CKMC 1210 50	SASKATCHEWAN	Sabinas XEBX 640 250
Calgary CFAC 930 100 F	Fort William CKPR 730 100 F	Moose Jaw CHAB 1200 100 F	Salttillo XEAS 1160 50
CFCN 1030 10000	Hamilton CHML 1010 100 F	Prince Albert CKBI 1210 100 F	XELA 1240 50
CJGJ 690 100 F	CKOC 1120 500 F	Regina CJRM 540 1000	Torreón XETB 1310 125
Edmonton CFRN 960 100 F	Kingston CFRC 1510 100 F	CKCK 1010 1000 F	Villa Acuna XERA 840 350000
CJCA 730 1000 F	Kirkland Lake CJKL 1310 100 F	Saskatoon CFQC 840 1000 F	D. F.
CKUA 580 500		Yorkton CJGX 1390 100 F	Atzacapotzalco XEMG 1060 100

NORTH AMERICAN B. C. STATIONS BY LOCATIONS

XEW 890 50000	SAN LUIS POTOSI	YUCATAN	GMCB 640 150
XEYO 940 500	San Luis Potosi	Merida	CMCD 950 250
Tacuba	XECZ 1370 100	XEBJ 1160 20	CMCF 810 600
XEFA 1180 500	XEXH 1250 250	XEFC 550 100	CMCG 680 1000
DURANGO	SINALOA	XEZ 630 500	CMCJ 1100 500
Durango	Mazatlan	CUBA	CMCM 850
XEE 1210 50	XEBL 1220 50	Caibarien	CMCO 1200 250
GUANAJUATO	SONORA	CMHD 1270 250	CMCQ 1410 250
Leon	Hermosillo	Camaguey	CMCU 1280 500
XEKL 1240 500	XEBH 930 500	CMJA 1010 300	CMCW 750 150
JALISCO	Nogales	CMJC 1390 150	CMCY 1030 150
Guadalajara	XEAF 990 750	CMJE 1220 50	CMK 730 3000
XEAD 1060 125	TAMAULIPAS	CMJF 1150 200	CMOA 1440 150
XED 1160 2500	Matamoros	CMJK 780 250	CMOX 1320 200
Guzman	XEAM 750 25	CMJL 1340 75	CMW 600 1400
XEBA 1080 20	Nuevo Laredo	CMJX 830 500	CMX 920 1000
MICHOACAN	XEBK 1000 100	Cardenas	Holguin
Morelia	XEDF 810 75	CMGE 1370 150	CMFK 1460 250
XEI 1370 125	XEFE 980 150	Ciego de Avila	CMKO 1280
NUEVO LEON	XENT 910 150000	CMJH 1360 50	Manzanillo
Monterrey	Reynosa	CMJI 1130 150	CMKM 1120 200
XEFB 870 200	XEAW 960 50000	CMJO 1180 50	Matanzas
XEFJ 1230 100	Tampico	Cienfuegos	CMG 1400 150
XEH 720 250	XEFW 1310 250	CMHJ 1160 175	CMGF 977 100
XET 690 5000	XES 990 250	CMHM 1450 100	CMGH 790 500
XEX 1310 125	VERACRUZ	CMHW 820 100	Moron
PUEBLA	Cordoba	CMHX 760 200	CMJP 1430 75
Puebla	XEAG 1310 10	Cruces	Pinar del Rio
XETH 1210 100	Jalapa	CMHK 1330 250	CMAB 1340
	XEXB 1270 50	Havana	Sagua la Grande
	XEXD 1340 350	CMBC 630	CMHA 1070 50
	Minatitlan	CMBD 1170 500	Sancti Spiritus
	XEDW 1150 20	CMBG 1140 200	CMHB 1240 50
	Veracruz	CMBS 770 150	Santa Clara
	XETF 1220 30	CMBX 1070 500	CMHI 1210 150
	XEU 1010 250	CMBY 970 150	Santiago
		CMCZ 1000 500	CMKC 1250 150
		CMC 1260 150	CMKD 1050 250
		CMCA 1350 450	CMKG 1160
			CMKR 1400 100
			CMKW 1350
			CMKX 1190

Tom Howard, who loves to argue with George Shelton to the delight of NBC listeners, was a grocery clerk in Philadelphia when circumstances made a comedian of him. At the slightest encouragement from customers, Tom would recite "The Face on the Barroom Floor," giving all 25 verses unless restrained. Finally, fired by his exasperated employer for persistence in this practice, Howard bobbed up in vaudeville as the "boob" comedian, forcibly

launched upon his career as an entertainer.

Robert L. Ripley's fame is based on his fascinating "believe-it-or-nots," but originally he was a comic artist. He was 14 and still living in his home town of Santa Rosa, Cal., when he sold his first drawing. Depicting a homely girl turning a clothes wringer and captioned "The Village Belle Was Slowly Ringing," it was purchased by Life, the humorous weekly, for \$8.

Next month we will show the names of owners and the mailing addresses of all the North American Radio Stations.

NORTH AMERICAN B. C. STATIONS BY CALLS

CFAC 930	100	CJKL 1310	100	CMBD 1170	500
Calgary, Alta.		Kirkland Lake, Ont.		Havana, Cuba	
CFCF 600	500	CJLS 1310	100	CMBG 1140	200
Montreal, Que.		Yarmouth, N. S.		Havana, Cuba	
CFCH 930	100	CJOC 950	100	CMBS 770	150
North Bay, Ont.		Lethbridge, Alta.		Havana, Cuba	
CFCN 1030	10000	CJOR 600	500	CMBX 1070	500
Calgary, Alta.		Vancouver, B. C.		Havana, Cuba	
CFCO 630	100	CJRC 630	500	CMBY 970	150
Chatham, Ont.		Winnipeg, Man.		Havana, Cuba	
CFCT 1450	50	CJRM 540	1000	CMBZ 1000	500
Victoria, B. C.		Regina, Sask.		Havana, Cuba	
CFCY 630	1000	CKAC 730	5000	CMC 1260	150
Charlottetown, P.E.I.		Montreal, Que.		Havana, Cuba	
CFJC 880	100	CKBI 1210	100	CMCA 1350	450
Kanloops, B. C.		Prince Albert, Sask.		Havana, Cuba	
CFLC 930	100	CKCD 1010	100	CMCB 640	150
Prescott, Ont.		Vancouver, B. C.		Havana, Cuba	
CFNB 550	500	CKCH 1210	100	CMCD 950	250
Fredericton, N. B.		Hull, Que.		Havana, Cuba	
CFPL 730	100	CKCK 1010	1000	CMCF 810	600
London, Ont.		Regina, Sask.		Havana, Cuba	
CFPR 580	50	CKCL 580	100	CMCG 680	1000
Prince Rupert, B. C.		Toronto, Ont.		Havana, Cuba	
CFQC 840	1000	CKCO 1010	100	CMCJ 1100	500
Saskatoon, Sask.		Ottawa, Ont.		Havana, Cuba	
CFRB 690	10000	CKCR 1510	100	CMCM 850	.....
Toronto, Ont.		Waterloo, Ont.		Havana, Cuba	
CFRC 1510	100	CKCV 1310	100	CMCO 1200	250
Kingston, Ont.		Quebec, Que.		Havana, Cuba	
CFRN 960	100	CKCW 1370	100	CMCQ 1410	250
Edmonton, Alta.		Moncton, N. B.		Havana, Cuba	
CHAB 1200	100	CKFC 1410	50	CMCU 1280	500
Moose Jaw, Sask.		Vancouver, B. C.		Havana, Cuba	
CHCK 1310	50	CKGB 1420	100	CMCW 750	150
Charlottetown, P.E.I.		Timmins, Ont.		Havana, Cuba	
CHGS 1450	50	CKIC 1010	50	CMCX 1030	150
Summerside, P.E.I.		Wolfville, N. S.		Havana, Cuba	
CHLP 1120	100	CKLW 1030	5000	CMCY 570	5000
Montreal, Que.		Windsor, Ont.		Havana, Cuba	
CHLT 1210	100	CKMC 1210	50	CMCG 1400	150
Sherbrooke, P. Q.		Cobalt, Ont.		Matanzas, Cuba	
CHML 1010	100	CKMO 1410	100	CMGE 1370	150
Hamilton, Ont.		Vancouver, B. C.		Cardenas, Cuba	
CHNC 960	1000	CKNX 1200	50	CMGF 977	100
New Carlisle, Que.		Wingham, Ont.		Matanzas, Cuba	
CHNS 930	1000	CKOC 1120	500	CMGH 790	500
Halifax, N. S.		Hamilton, Ont.		Matanzas, Cuba	
CHRC 580	100	CKOV 630	100	CMHA 1070	50
Quebec, Que.		Kelowna, B. C.		Sagua la Grande, Cuba	
CHSJ 1120	500	CKPC 930	100	CMHB 1240	50
St. John, N. B.		Brantford, Ont.		Sancti Spiritus, Cuba	
CHWK 780	100	CKPR 730	100	CMHD 1270	250
Chilliwack, B. C.		Fort William, Ont.		Caibarien, Cuba	
CJAT 910	1000	CKSO 780	1000	CMHI 1210	150
Trail, B. C.		Sudbury, Ont.		Santa Clara, Cuba	
CJCA 730	1000	CKTB 1200	100	CMHJ 1160	175
Edmonton, Alta.		St. Catharines, Ont.		Cienfuegos, Cuba	
CJCB 1240	1000	CKUA 580	500	CMHK 1330	250
Sydney, N. S.		Edmonton, Alta.		Cruces, Cuba	
CJ CJ 690	100	CKWX 1010	100	CMHM 1450	100
Calgary, Alta.		Vancouver, B. C.		Cienfuegos, Cuba	
CJCS 1210	50	CKX 1120	1000	CMHW 820	100
Stratford, Ont.		Brandon, Man.		Cienfuegos, Cuba	
CJCU 1210	50	CKY 910	15000	CMHX 760	200
Aklavik, N. W. T.		Winnipeg, Man.		Cienfuegos, Cuba	
CJGX 1390	100	CMAB 1340		CMJA 1010	300
Yorkton, Sask.		Pinar del Rio, Cuba		Camaguey, Cuba	
CJIC 1500	100	CMBC 630	.....	CMJC 1390	150
S. Ste. Marie, Ont.		Havana, Cuba		Camaguey, Cuba	

NORTH AMERICAN B. C. STATIONS BY CALLS

CMJE 1220 Camaguey, Cuba	50	KALB 1210 Alexandria, La.	100	KEUB 1420 Price, Utah	100
CMJF 1150 Camaguey, Cuba	200	KALE 1300 Portland, Ore.	500	KEX 1180 Portland, Ore.	5000
CMJH 1360 Ciego de Avila, Cuba	50	KAND 1310 Corsicana, Texas	100	KFAB 770 Lincoln, Neb.	10000
CMJI 1130 Ciego de Avila, Cuba	150	KANS 1210 Wichita, Kans.	100	KFAC 1300 Los Angeles, Calif.	1000
CMJK 780 Camaguey, Cuba	250	KARK 890 Little Rock, Ark.	500	KFAM 1420 St. Cloud, Minn.	100
CMJL 1340 Camaguey, Cuba	75	KARM 1310 Fresno, Calif.	100	KFBB 1280 Great Falls, Mont.	1000
CMJO 1180 Ciego de Avila, Cuba	50	KASA 1210 Elk City, Okla.	100	KFBI 1050 Abilene, Kans.	5000
CMJP 1430 Camaguey, Cuba	75	KAST 1370 Astoria, Ore.	100	KFBK 1490 Sacramento, Calif.	5000
CMJX 830 Camaguey, Cuba	500	KATE 1420 Albert Lea, Minn.	250	KFDM 560 Beaumont, Texas	500
CMK 730 Havana, Cuba	3000	KAWM 1500 Gallup, N. Mex.	100	KFDY 780 Brookings, S. D.	1000
CMKC 1250 Santiago, Cuba	150	KBIX 1500 Muskogee, Okla.	100	KFEL 920 Denver, Colo.	500
CMKD 1050 Santiago, Cuba	250	KBPS 1420 Portland, Ore.	100	KFEQ 680 St. Joseph, Mo.	2500
CMKF 1460 Holguin, Cuba	250	KBST 1500 Big Spring, Texas	100	KFGQ 1370 Boone, Iowa	100
CMKG 1160 Santiago, Cuba	.....	KBTM 1200 Jonesboro, Ark.	100	KFH 1300 Wichita, Kans.	1000
CMKM 1120 Manzanillo, Cuba	200	KCKN 1310 Kansas City, Kans.	100	KFI 640 Los Angeles, Calif.	50000
CMKO 1280 Holguin, Cuba	.....	KCMC 1420 Texarkana, Texas	100	KFIO 1120 Spokane, Wash.	100
CMKR 1400 Santiago, Cuba	100	KCMO 1370 Kansas City, Mo.	100	KFIZ 1420 Fond du Lac, Wis.	100
CMKW 1350 Santiago, Cuba	.....	KCRC 1360 Enid, Okla.	250	KFJB 1200 Marshalltown, Iowa	100
CMKX 1190 Santiago, Cuba	.....	KCRJ 1310 Jerome, Ariz.	100	KFJI 1210 Klamath Falls, Ore.	100
CMOA 1440 Havana, Cuba	150	KDAL 1500 Duluth, Minn.	100	KFJM 1410 Grand Forks, N. D.	500
CMOX 1320 Havana, Cuba	200	KDB 1500 Santa Barbara, Calif.	100	KFJZ 1370 Fort Worth, Texas	100
CMQ 880 Havana, Cuba	2500	KDFN 1440 Casper, Wyo.	500	KFKA 880 Greeley, Colo.	500
CMW 600 Havana, Cuba	1400	KDKA 980 Pittsburgh, Pa.	50000	KFKU 1220 Lawrence, Kans.	1000
CMX 920 Havana, Cuba	1000	KDLR 1210 Devils Lake, N. D.	100	KFNF 890 Shenandoah, Iowa	500
CRCK 1050 Quebec, Que.	1000	KDNC 1200 Lewistown, Mont.	100	KFOR 1210 Lincoln, Neb.	100
CRCM 910 Montreal, Que.	5000	KDON 1210 Monterrey, Calif.	100	KFOX 1250 Long Beach, Calif.	1000
CRCO 880 Ottawa, Ont.	1000	KDTH 1340 Dubuque, Iowa	500	KFPL 1310 Dublin, Texas	100
CRCS 950 Chicoutimi, Que.	100	KDYL 1290 Salt Lake City, Utah	1000	KFPW 1210 Fort Smith, Ark.	100
CRCT 840 Toronto, Ont.	5000	KECA 1430 Los Angeles, Calif.	1000	KFPY 890 Spokane, Wash.	1000
CRCV 1100 Vancouver, B. C.	5000	KEEN 1370 Seattle, Wash.	100	KFQD 780 Anchorage, Alaska	250
CRCW 600 Windsor, Ont.	500	KEHE 780 Los Angeles, Calif.	1000	KFRC 610 San Francisco, Calif.	1000
CRCY 1420 Toronto, Ont.	100	KELA 1440 Centralia, Wash.	500	KFRO 1370 Longview, Texas	250
KABC 1420 San Antonio, Texas	100	KELD 1370 El Dorado, Ark.	100	KFRU 630 Columbia, Mo.	500
KABR 1420 Aberdeen, S. Dak.	100	KELO 1200 Sioux Falls, S. Dak.	100	KFSD 600 San Diego, Calif.	1000
KADA 1200 Ada, Okla.	100	KERN 1370 Bakersfield, Calif.	100	KFSG 1120 Los Angeles, Calif.	500

NORTH AMERICAN B. C. STATIONS BY CALLS

KFUO 550 500	KGHI 1200 100	KIUL 1210 100
St. Louis, Mo.	Little Rock, Ark.	Garden City, Kans.
KFVD 1000 1000	KGHL 780 1000	KIUN 1420 100
Los Angeles, Calif.	Billings, Mont.	Pecos, Texas
KFVS 1210 100	KGIR 1340 1000	KIUP 1370 100
Cape Girardeau, Mo.	Butte, Mont.	Durango, Colo.
KFWB 550 1000	KGIW 1420 100	KJBS 1070 500
Hollywood, Calif.	Alamosa, Colo.	San Francisco, Calif.
KFXD 1200 100	KGKB 1500 100	KJR 970 5000
Nampa, Idaho	Tyler, Texas	Seattle, Wash.
KFXJ 1200 100	KGKL 1370 100	KLAH 1210 100
Grand Junction, Colo.	San Angelo, Texas	Carlsbad, N. Mex.
KFXM 1210 100	KGKO 570 250	KLBM 1420 100
San Bernardino, Calif.	Wichita Falls, Texas	La Grande, Ore.
KFXR 1310 100	KGKY 1500 100	KLGN 1290 100
Oklahoma City, Okla.	Scottsbluff, Neb.	Blytheville, Ark.
KFYO 1310 100	KGLO 1210 100	KLO 1400 500
Lubbock, Texas	Mason City, Iowa	Ogden, Utah
KFYR 550 1000	KGMB 1320 1000	KLPM 1240 250
Bismarck, N. D.	Honolulu, T. H.	Minot, N. D.
KGA 1470 5000	KGNC 1410 1000	KLRA 1390 1000
Spokane, Wash.	Amarillo, Texas	Little Rock, Ark.
KGAR 1370 100	KGNF 1430 1000	KLS 1280 250
Tucson, Ariz.	North Platte, Neb.	Oakland, Calif.
KGB 1330 1000	KGNO 1340 250	KLUF 1370 100
San Diego, Calif.	Dodge City, Kans.	Galveston, Texas
KGBU 900 500	KGO 790 7500	KLX 880 1000
Ketchikan, Alaska	San Francisco, Calif.	Oakland, Calif.
KGBX 1230 500	KGU 750 2500	KLZ 560 1000
Springfield, Mo.	Honolulu, T. H.	Denver, Colo.
KGCA 1270 100	KGVL 1200 100	KMA 930 1000
Decorah, Iowa	Greenville, Texas	Shenandoah, Iowa
KGCU 1240 250	KGVO 1260 1000	KMAC 1370 100
Mandan, N. D.	Missoula, Mont.	San Antonio, Texas
KGCX 1450 1000	KGW 620 1000	KMBC 950 1000
Wolf Point, Mont.	Portland, Ore.	Kansas City, Mo.
KGDE 1200 100	KGY 1210 100	KMED 1410 250
Fergus Falls, Minn.	Olympia, Wash.	Medford, Ore.
KGDM 1100 1000	KHBC 1400 250	KMJ 580 1000
Stockton, Calif.	Hilo, T. H.	Fresno, Calif.
KGDY 1340 250	KHBG 1210 100	KMLB 1200 100
Huron, S. D.	Okmulgee, Okla.	Monroe, La.
KGEK 1200 100	KHJ 900 1000	KMMJ 740 1000
Sterling, Colo.	Los Angeles, Calif.	Clay Center, Neb.
KGER 1360 1000	KHQ 590 1000	KMO 1330 1000
Long Beach, Calif.	Spokane, Wash.	Tacoma, Wash.
KGEZ 1310 100	KHSL 1260 250	KMOX 1090 50000
Kalispell, Mont.	Chico, Calif.	St. Louis, Mo.
KGFF 1420 100	KHUB 1310 250	KMPC 710 500
Shawnee, Okla.	Watsonville, Calif.	Beverly Hills, Calif.
KGFI 1500 100	KICA 1370 100	KMTR 570 1000
Corpus Christi, Tex.	Clovis, N. M.	Los Angeles, Calif.
KGfJ 1200 100	KID 1320 500	KNEL 1500 250
Los Angeles, Calif.	Idaho Falls, Idaho	Brady, Texas
KGFL 1370 100	KIDO 1350 1000	KNET 1420 100
Roswell, N. M.	Boise, Idaho	Palestine, Texas
KGFW 1310 100	KIDW 1420 100	KNOW 1500 100
Kearney, Neb.	Lamar, Colo.	Austin, Texas
KGFX 630 200	KIEM 1450 500	KNX 1050 50000
Pierre, S. D.	Eureka, Calif.	Los Angeles, Calif.
KGGC 1420 100	KIEV 850 250	KOA 830 50000
San Francisco, Calif.	Glendale, Calif.	Denver, Colo.
KGGF 1010 1000	KINY 1310 100	KOAC 550 1000
Coffeyville, Kans.	Juneau, Alaska	Corvallis, Ore.
KGGM 1230 1000	KIRO 710 1000	KOAM 790 1000
Albuquerque, N. M.	Seattle, Wash.	Pittsburg, Kans.
KGHF 1320 500	KIT 1310 100	KOB 1180 10000
Pueblo, Colo.	Yakima, Wash.	Albuquerque, N. M.

NORTH AMERICAN B. C. STATIONS BY CALLS

KOBH 1370 Rapid City, S. Dak.	100	KRLC 1390 Lewiston, Idaho	250	KTKC 1190 Visalia, Calif.	250
KOCA 1210 Kilgore, Texas	100	KRLD 1040 Dallas, Texas	10000	KTMS 1220 Santa Barbara, Calif.	500
KOH 1380 Reno, Nev.	500	KRLH 1420 Midland, Texas	100	KTOK 1370 Oklahoma City, Okla.	100
KOIL 1260 Omaha, Neb.	1000	KRMC 1370 Jamestown, N. Dak.	100	KTRB 740 Modesto, Calif.	250
KOIN 940 Portland, Ore.	1000	KRMD 1310 Shreveport, La.	100	KTRH 1290 Houston, Texas	1000
KOKO 1370 La Junta, Colo.	100	KRRR 1500 Roseburg, Ore.	100	KTRI 1420 Sioux City, Iowa	100
KOL 1270 Seattle, Wash.	1000	KRNT 1320 Des Moines, Iowa	1000	KTSA 550 San Antonio, Texas	1000
KOMA 1480 Oklahoma City, Okla.	5000	KROC 1310 Rochester, Minn.	100	KTSM 1310 El Paso, Texas	100
KOMO 920 Seattle, Wash.	1000	KROD 1500 El Paso, Texas	100	KTUL 1400 Tulsa, Okla.	500
KONO 1370 San Antonio, Texas	100	KROW 930 Oakland, Calif.	1000	KTW 1220 Seattle, Wash.	1000
KOOS 1200 Marshfield, Ore.	100	KROY 1210 Sacramento, Calif.	100	KUJ 1370 Walla Walla, Wash.	100
KORE 1420 Eugene, Ore.	100	KRQA 1310 Santa Fe, N. Mex.	100	KUMA 1420 Yuma, Ariz.	100
KOTN 1500 Pine Bluff, Ark.	100	KRRV 1310 Sherman, Texas	250	KUOA 1260 Siloam Springs, Ark.	2500
KOVC 1500 Valley City, N. Dak.	100	KRSC 1120 Seattle, Wash.	250	KUSD 890 Vermillion, S. Dak.	500
KOY 1390 Phoenix, Ariz.	1000	KSAC 580 Manhattan, Kans.	500	KUTA 1500 Salt Lake City, Utah	100
KPAC 1260 Port Arthur, Texas	500	KSAL 1500 Salina, Kans.	100	KVCV 1200 Redding, Calif.	100
KPDN 1310 Pampa, Texas	100	KSCJ 1330 Sioux City, Iowa	1000	KVEC 1200 San Luis Obispo, Cal.	250
KPFA 1210 Helena, Mont.	100	KSD 550 St. Louis, Mo.	1000	KVGB 1370 Great Bend, Kans.	100
KPLC 1500 Lake Charles, La.	100	KSEI 900 Pocatello, Idaho	250	KVI 570 Tacoma, Wash.	1000
KPLT 1500 Paris, Texas	100	KSFO 560 San Francisco, Calif.	1000	KVOA 1260 Tucson, Ariz.	1000
KPMC 1550 Bakersfield, Calif.	1000	KSL 1130 Salt Lake City, Utah	50000	KVOD 920 Denver, Colo.	500
KPO 680 San Francisco, Calif.	50000	KSLM 1370 Salem, Ore.	100	KVOE 1500 Santa Ana, Calif.	100
KPOF 880 Denver, Colo.	500	KSO 1430 Des Moines, Iowa	500	KVOL 1310 Lafayette, La.	100
KPPC 1210 Pasadena, Calif.	100	KSOO 1110 Sioux Falls, S. Dak.	2500	KVoo 1140 Tulsa, Okla.	25000
KPQ 1500 Wenatchee, Wash.	100	KSRO 1310 Santa Rosa, Calif.	250	KVOR 1270 Colorado Springs, Colo.	1000
KPRC 920 Houston, Texas	1000	KSTP 1460 St. Paul, Minn.	10000	KVOS 1200 Bellingham, Wash.	100
KQV 1380 Pittsburgh, Pa.	500	KSUB 1310 Cedar City, Utah	100	KVOX 1310 Moorhead, Minn.	100
KQW 1010 San Jose, Calif.	1000	KSUN 1200 Lowell, Ariz.	100	KVSO 1210 Ardmore, Okla.	100
KRBA 1310 Lufkin, Texas	100	KTAR 620 Phoenix, Ariz.	1000	KWBG 1420 Hutchinson, Kans.	100
KRBC 1420 Ablene, Texas	100	KTAT 1240 Fort Worth, Texas	1000	KWC 1200 Stockton, Calif.	100
KRE 1370 Berkeley, Calif.	100	KTBC 1120 Austin, Texas	1000	KWJJ 1040 Portland, Ore.	500
KRCV 1260 Weslaco, Texas	1000	KTBS 1450 Shreveport, La.	1000	KWK 1350 St. Louis, Mo.	1000
KRIS 1330 Corpus Christi, Tex.	500	KTEM 1370 Tempe, Texas	250	KWKH 1100 Shreveport, La.	10000
KRKD 1120 Los Angeles, Calif.	500	KTFI 1240 Twin Falls, Idaho	1000	KWLC 1270 Decorah, Iowa	100
KRKO 1370 Everett, Wash.	50	KTHS 1060 Hot Springs, Ark.	10000	KWNO 1200 Winona, Minn.	100

NORTH AMERICAN B. C. STATIONS BY CALLS

KWOS 1310 Jefferson City, Mo.	WAIR 1250 250 Winston-Salem, N. C.	WBNY 1370 100 Buffalo, N. Y.
KWSC 1220 1000 Pullman, Wash.	WALA 1380 500 Mobile, Ala.	WBOQ 860 50000 New York, N. Y.
KWTN 1210 100 Watertown, S. Dak.	WALR 1210 100 Zanesville, Ohio	WBOW 1310 100 Terre Haute, Ind.
KWTO 560 5000 Springfield, Mo.	WAML 1310 100 Laurel, Miss.	WBRB 1210 100 Red Bank, N. J.
KWYO 1370 100 Sheridan, Wyo.	WAPI 1140 5000 Birmingham, Ala.	WBRC 930 1000 Birmingham, Ala.
KXA 760 250 Seattle, Wash.	WAPQ 1420 100 Chattanooga, Tenn.	WBRE 1310 100 Wilkes-Barre, Pa.
KXBY 1530 1000 Kansas City, Mo.	WASH 1270 500 Grand Rapids, Mich.	WBRR 1310 100 Pittsfield, Mass.
KXL 1420 100 Portland, Ore.	WATL 1370 100 Atlanta, Ga.	WBRY 1530 1000 Waterbury, Conn.
KXO 1500 100 El Centro, Calif.	WATR 1190 100 Waterbury, Conn.	WBT 1080 50000 Charlotte, N. C.
KXRO 1310 100 Aberdeen, Wash.	WAVE 940 1000 Louisville, Ky.	WBTM 1370 100 Danville, Va.
KXYZ 1440 1000 Houston, Texas	WAWZ 1350 500 Zarephath, N. J.	WBZ 990 50000 Boston, Mass.
KYA 1230 1000 San Francisco, Calif.	WAYX 1200 100 Waycross, Ga.	WBZA 990 1000 Springfield, Mass.
KYOS 1040 250 Merced, Calif.	WAZL 1420 100 Hazleton, Pa.	WCAD 1220 500 Canton, N. Y.
KYV 1020 10000 Philadelphia, Pa.	WBAA 890 500 West Lafayette, Ind.	WCAL 1220 1000 Pittsburgh, Pa.
VAS 685 2000 Gloucester, N. S.	WBAL 760 2500 Baltimore, Md.	WCAL 1250 1000 Northfield, Minn.
VOAC 1065 40 St. John's, Nfld.	WBAL 1050 10000 Baltimore, Md.	WCAM 1280 500 Camden, N. J.
VOAS 940 100 St. John's, Nfld.	WBAP 800 50000 Fort Worth, Texas	WCAO 600 500 Baltimore, Md.
VOCM 1006 200 St. John's, Nfld.	WBAX 1210 100 Wilkes-Barre, Pa.	WCAP 1280 500 Asbury Park, N. J.
VOGY 840 400 St. John's, Nfld.	WBBC 1400 500 Brooklyn, N. Y.	WCAT 1200 100 Rapid City, S. Dak.
VONF 1195 500 St. John's, Nfld.	WBBL 1210 100 Richmond, Va.	WCAU 1170 50000 Philadelphia, Pa.
VOWR 681 500 St. John's, Nfld.	WBMM 770 50000 Chicago, Ill.	WCAX 1200 100 Burlington, Vt.
WAAB 1410 500 Boston, Mass.	WBBR 1300 1000 Brooklyn, N. Y.	WCAY 1070 100 Carthage, Ill.
WAAF 920 1000 Chicago, Ill.	WBBZ 1200 100 Ponca City, Okla.	WCBA 1440 500 Allentown, Pa.
WAAT 940 500 Jersey City, N. J.	WBCM 1410 500 Bay City, Mich.	WCBD 1080 5000 Chicago, Ill.
WAAW 560 500 Omaha, Neb.	WBEN 900 1000 Buffalo, N. Y.	WCBM 1370 100 Baltimore, Md.
WABC 860 50000 New York, N. Y.	WBEO 1310 100 Marquette, Mich.	WCBS 1420 100 Springfield, Ill.
WABI 1200 100 Bangor, Maine	WBHP 1200 100 Huntsville, Ala.	WCCO 810 50000 Minneapolis, Minn.
WABY 1370 100 Albany, N. Y.	WBIG 1440 1000 Greensboro, N. C.	WCFL 970 5000 Chicago, Ill.
WACO 1420 100 Waco, Texas	WBIL 1100 5000 New York, N. Y.	WCHS 580 500 Charleston, W. Va.
WADC 1320 1000 Akron, Ohio	WBLK 1370 100 Clarksburg, W. Va.	WCHV 1420 100 Charlottesville, Va.
WAGA 1450 500 Atlanta, Ga.	WBLY 1210 100 Lima, Ohio	WCKY 1490 10000 Covington, Ky.
WAGF 1370 250 Dothan, Ala.	WBNO 1200 100 New Orleans, La.	WCLO 1200 100 Janesville, Wis.
WAGM 1420 100 Presque Isle, Me.	WBNS 1430 500 Columbus, Ohio	WCLS 1310 100 Joliet, Ill.
WAIM 1200 100 Anderson, S. C.	WBNX 1350 1000 New York, N. Y.	WCMI 1310 100 Ashland, Ky.
		WCNW 1500 100 Brooklyn, N. Y.

NORTH AMERICAN B. C. STATIONS BY CALLS

WCOA 1340	500	WEEU 830	1000	WGCM 1210	100
Pensacola, Fla.		Reading, Pa.		Gulfport, Miss.	
WCOC 880	500	WELI 900	500	WGES 1360	500
Meridian, Miss.		New Haven, Conn.		Chicago, Ill.	
WCOL 1210	100	WELL 1420	100	WGH 1310	100
Columbus, Ohio		Battle Creek, Mich.		Newport News, Va.	
WCOP 1120	500	WEMP 1310	100	WGL 1370	100
Boston, Mass.		Milwaukee, Wis.		Fort Wayne, Ind.	
WCPO 1200	100	WENR 870	50000	WGN 720	50000
Cincinnati, Ohio		Chicago, Ill.		Chicago, Ill.	
WCRW 1210	100	WEOA 1370	100	WGNV 1210	100
Chicago, Ill.		Evansville, Ind.		Newburgh, N. Y.	
WCSC 1360	500	WESG 850	1000	WGNC 1420	100
Charleston, S. C.		Elmira, N. Y.		Albany, Ga.	
WCSH 940	1000	WEST 1200	100	WGR 550	1000
Portland, Me.		Easton, Pa.		Buffalo, N. Y.	
WDAE 1220	1000	WEVD 1300	1000	WGRG 1370	250
Tampa, Fla.		New York, N. Y.		New Albany, Ind.	
WDAF 610	1000	WEW 760	1000	WGST 890	1000
Kansas City, Mo.		St. Louis, Mo.		Atlanta, Ga.	
WDAH 1310	100	WEXL 1310	50	WGTM 1420	100
El Paso, Texas		Royal Oak, Mich.		Wilson, N. C.	
WDAS 1370	100	WFAA 800	50000	WGVA 1050	1000
Philadelphia, Pa.		Dallas, Texas		Indianapolis, Ind.	
WDAY 940	1000	WFAB 1300	1000	WGY 790	50000
Fargo, N. Dak.		New York, N. Y.		Schenectady, N. Y.	
WDBJ 930	1000	WFAM 1200	100	WHA 940	5000
Roanoke, Va.		South Bend, Ind.		Madison, Wis.	
WDBO 580	1000	WFAS 1210	100	WHAL 950	500
Orlando, Fla.		White Plains, N. Y.		Saginaw, Mich.	
WDEL 1120	250	WFBC 1300	1000	WHAM 1150	50000
Wilmington, Del.		Greenville, S. C.		Rochester, N. Y.	
WDEV 550	500	WFBG 1310	100	WHAS 820	50000
Waterbury, Vt.		Altoona, Pa.		Louisville, Ky.	
WDGY 1180	1000	WFBL 1360	1000	WHAT 1310	100
Minneapolis, Minn.		Syracuse, N. Y.		Philadelphia, Pa.	
WDNC 1500	100	WFBM 1230	1000	WHAZ 1300	500
Durham, N. C.		Indianapolis, Ind.		Troy, N. Y.	
WDD 1280	1000	WFBR 1270	500	WHB 860	1000
Chattanooga, Tenn.		Baltimore, Md.		Kansas City, Mo.	
WDR 1330	1000	WDFD 1310	100	WHBB 1500	100
Hartford, Conn.		Flint, Mich.		Seima, Ala.	
WDSM 1200	100	WFEA 1340	500	WHBC 1200	100
Superior, Wis.		Manchester, N. H.		Canton, Ohio	
WDSU 1250	1000	WFIL 560	1000	WHBF 1210	100
New Orleans, La.		Philadelphia, Pa.		Rock Island, Ill.	
WDWS 1370	100	WFLA 620	1000	WHBI 1250	1000
Champaign, Ill.		Clearwater, Fla.		Newark, N. J.	
WDZ 1020	250	WFMD 900	500	WHBL 1300	250
Tuscola, Ill.		Frederick, Md.		Sheboygan, Wis.	
WEAF 660	50000	WFOR 1370	100	WHBQ 1370	100
New York, N. Y.		Hattiesburg, Miss.		Memphis, Tenn.	
WEAN 780	1000	WFOY 1210	100	WHBU 1210	100
Providence, R. I.		St. Augustine, Fla.		Anderson, Ind.	
WEAU 1050	1000	WFTC 1200	100	WHBY 1200	100
Eau Claire, Wis.		Kinston, N. C.		Green Bay, Wis.	
WEBC 1290	1000	WGAL 1500	100	WHDF 1370	100
Duluth, Minn.		Lancaster, Pa.		Calumet, Mich.	
WEBQ 1210	100	WGAN 640	500	WHDH 830	1000
Harrisburg, Ill.		Portland, Me.		Boston, Mass.	
WEBR 1310	100	WGAR 1450	500	WHDL 1400	250
Buffalo, N. Y.		Cleveland, Ohio		Olean, N. Y.	
WEDC 1210	100	WGBB 1210	100	WHEB 740	250
Chicago, Ill.		Freeport, N. Y.		Portsmouth, N. H.	
WEED 1420	100	WGBF 630	500	WHEC 1430	500
Rocky Mount, N. C.		Evansville, Ind.		Rochester, N. Y.	
WEEI 590	1000	WGBI 880	500	WHEF 1500	100
Boston, Mass.		Scranton, Pa.		Kosciusko, Miss.	

NORTH AMERICAN B. C. STATIONS BY CALLS

WHFC 1420 Cicero, Ill.	100	WJAX 900 Jacksonville, Fla.	1000	WKY 900 Oklahoma City, Okla.	1000
WHIO 1260 Dayton, Ohio	1000	WJAY 610 Cleveland, Ohio	500	WKZO 590 Kalamazoo, Mich.	1000
WHIP 1480 Hammond, Ind.	5000	WJBC 1200 Bloomington, Ill.	100	WLAC 1470 Nashville, Tenn.	5000
WHIS 1410 Bluefield, W. Va.	500	WJBK 1500 Detroit, Mich.	100	WLAK 1310 Lakeland, Fla.	100
WHJB 620 Greensburg, Pa.	250	WJBL 1200 Decatur, Ill.	100	WLAP 1420 Lexington, Ky.	100
WHK 1390 Cleveland, Ohio	1000	WJBO 1120 Baton Rouge, La.	500	WLAW 680 Lawrence, Mass.	1000
WHKC 640 Columbus, Ohio	500	WJBR 1420 Gastonia, N. C.	100	WLB 1250 Minneapolis, Minn.	1000
WHLB 1370 Virginia, Minn.	100	WJBW 1200 New Orleans, La.	100	WLBC 1310 Muncie, Ind.	100
WHN 1010 New York, N. Y.	1000	WJBY 1210 Gadsden, Ala.	100	WLBL 900 Stevens Point, Wis.	2500
WHO 1000 Des Moines, Iowa	50000	WJDX 1270 Jackson, Miss.	1000	WLBZ 620 Bangor, Me.	500
WHOM 1450 Jersey City, N. J.	250	WJEJ 1210 Hagerstown, Md.	100	WLEU 1420 Erie, Pa.	100
WHP 1430 Harrisburg, Pa.	500	WJIM 1210 Lansing, Mich.	100	WLLH 1370 Lowell, Mass.	100
WIBA 1280 Madison, Wis.	1000	WJJD 1130 Chicago, Ill.	20000	WLMU 1210 Middlesboro, Ky.	100
WIBG 970 Glenside, Pa.	100	WJMS 1420 Ironwood, Mich.	100	WLNH 1310 Laconia, N. H.	100
WIBM 1370 Jackson, Mich.	100	WJNO 1200 W. Palm Beach, Fla.	100	WLS 870 Chicago, Ill.	50000
WIBU 1210 Poynette, Wis.	100	WJR 750 Detroit, Mich.	50000	WLVA 1200 Lynchburg, Va.	100
WIBW 580 Topeka, Kans.	1000	WJRD 1200 Tuscaloosa, Ala.	100	WLW 700 Cincinnati, Ohio	50000
WIBX 1460 Utica, N. Y.	100	WJSV 1400 Washington, D. C.	10000	WMAI 630 Washington, D. C.	250
WICA 940 Ashtabula, Ohio	250	WJTN 1210 Janestown, N. Y.	100	WMAQ 670 Chicago, Ill.	50000
WICC 600 Bridgeport, Conn.	500	WJW 1210 Akron, Ohio	100	WMAS 1420 Springfield, Mass.	100
WIL 1200 St. Louis, Mo.	100	WJZ 760 New York, N. Y.	50000	WMAZ 1180 Macon, Ga.	1000
WILL 580 Urbana, Ill.	1000	WKAQ 1240 San Juan, P. R.	1000	WMBC 1420 Detroit, Mich.	100
WILM 1420 Wilmington, Del.	100	W KAR 850 East Lansing, Mich.	1000	WMBD 1440 Peoria, Ill.	500
WIND 560 Gary, Ind.	1000	WKAT 1500 Miami Beach, Fla.	100	WMBG 1350 Richmond, Va.	500
WINS 1180 New York, N. Y.	1000	WKBB 1500 East Dubuque, Ill.	100	WMBH 1420 Joplin, Mo.	100
WIOD 1300 Miami, Fla.	1000	WKBH 1380 LaCrosse, Wis.	1000	WMBI 1080 Chicago, Ill.	5000
WIP 610 Philadelphia, Pa.	1000	WKBN 570 Youngstown, Ohio	500	WMBQ 1310 Auburn, N. Y.	100
WIRE 1400 Indianapolis, Ind.	1000	WKBO 1200 Harrisburg, Pa.	100	WMBQ 1500 Brooklyn, N. Y.	100
WIS 560 Columbia, S. C.	1000	WKBV 1500 Richmond, Ind.	100	WMBR 1370 Jacksonville, Fla.	100
WISN 1120 Milwaukee, Wis.	250	WKBW 1480 Buffalo, N. Y.	5000	WMBS 1420 Unlontown, Pa.	250
WJAC 1310 Johnstown, Pa.	100	WKBZ 1500 Muskegon, Mich.	100	WMC 780 Memphis, Tenn.	1000
WJAG 1060 Norfolk, Neb.	1000	WKEU 1500 Griffin, Ga.	100	WMCA 570 New York, N. Y.	1000
WJAR 890 Providence, R. I.	1000	WKOK 1210 Sunbury, Pa.	100	WMEX 1500 Boston, Mass.	100
WJAS 1290 Pittsburgh, Pa.	1000	WKRC 550 Cincinnati, Ohio	1000	WMFD 1370 Wilmington, N. C.	100
				WFFF 1310 Plattsburg, N. Y.	100

NORTH AMERICAN B. C. STATIONS BY CALLS

WMFG 1210 Hibbing, Minn.	100	WOPI 1500 Bristol, Tenn.	100	WRNL 880 Richmond, Va.	500
WMFJ 1420 Daytona Beach, Fla.	100	WOR 710 Newark, N. J.	50000	WROK 1410 Rockford, Ill.	500
WMFN 1210 Grenada, Miss.	100	WORC 1280 Worcester, Mass.	500	WROL 1310 Knoxville, Tenn.	100
WMFO 1370 Decatur, Ala.	100	WORK 1320 York, Pa.	1000	WRR 1280 Dallas, Texas	500
WMFR 1200 High Point, N. C.	100	WORL 920 Boston, Mass.	500	WRTD 1500 Richmond, Va.	100
WMIN 1370 St. Paul, Minn.	100	WOSU 570 Columbus, Ohio	750	WRUF 830 Gainesville, Fla.	5000
WMMN 890 Fairmont, W. Va.	500	WOV 1130 New York, N. Y.	1000	WRVA 1110 Richmond, Va.	5000
WMPC 1200 Lapeer, Mich.	100	WOW 590 Omaha, Neb.	1000	WSAI 1330 Cincinnati, Ohio	1000
WMPS 1430 Memphis, Tenn.	500	WOWO 1160 Fort Wayne, Ind.	10000	WSAJ 1310 Grove City, Pa.	100
WMSD 1420 Sheffield, Ala.	100	WPAD 1420 Paducah, Ky.	100	WSAL 1200 Salisbury, Md.	250
WMT 600 Cedar Rapids, Iowa	1000	WPAR 1420 Parkersburg, W. Va.	100	WSAN 1440 Allentown, Pa.	500
WNAC 1230 Boston, Mass.	1000	WPAX 1210 Thomasville, Ga.	100	WSAR 1450 Fall River, Mass.	1000
WNAD 1010 Norman, Okla.	1000	WPAY 1370 Portsmouth, Ohio	100	WSAU 1370 Wausau, Wis.	100
WNAX 570 Yankton, S. D.	1000	WPEN 920 Philadelphia, Pa.	1000	WSAY 1210 Rochester, N. Y.	100
WNBC 1380 New Britain, Conn.	250	WPG 1100 Atlantic City, N. J.	5000	WSAZ 1190 Huntington, W. Va.	1000
WNBF 1500 Binghamton, N. Y.	100	WPRA 1370 Mayaguez, P. R.	100	WSB 740 Atlanta, Ga.	50000
WNBH 1310 New Bedford, Mass.	100	WPRO 630 Providence, R. I.	500	WSBC 1210 Chicago, Ill.	100
WNBX 1260 Springfield, Vt.	1000	WPRP 1420 Ponce, P. R.	100	WSBT 1360 South Bend, Ind.	500
WNBZ 1290 Saranac Lake, N. Y.	100	WPTF 680 Raleigh, N. C.	1000	WSFA 1410 Montgomery, Ala.	500
WNEL 1290 San Juan, P. R.	1000	WQAM 560 Miami, Fla.	1000	WSGN 1310 Birmingham, Ala.	100
WNEW 1250 New York, N. Y.	1000	WQAN 880 Scranton, Pa.	500	WSIX 1210 Nashville, Tenn.	100
WNLC 1500 New London, Conn.	100	WQBC 1360 Vicksburg, Miss.	1000	WSJS 1310 Winston-Salem, N. C.	100
WNNY 1420 Watertown, N. Y.	100	WQDM 1390 St. Albans, Vt.	1000	WSM 650 Nashville, Tenn.	50000
WNOX 1010 Knoxville, Tenn.	1000	WQXR 1550 New York, N. Y.	1000	WSMB 1320 New Orleans, La.	1000
WNYC 810 New York, N. Y.	1000	WRAK 1370 Williamsport, Pa.	100	WSMK 1380 Dayton, Ohio	200
WOAI 1190 San Antonio, Texas	50000	WRAW 1310 Reading, Pa.	100	WSNJ 1210 Bridgeton, N. J.	100
WOC 1370 Davenport, Iowa	100	WRAX 920 Philadelphia, Pa.	1000	WSOC 1210 Charlotte, N. C.	100
WOI 640 Ames, Iowa	5000	WRBL 1200 Columbus, Ga.	100	WSPA 920 Spartanburg, S. C.	1000
WOKO 1430 Albany, N. Y.	500	WRC 950 Washington, D. C.	500	WSPD 1340 Toledo, Ohio	1000
WOL 1310 Washington, D. C.	100	WRDO 1370 Augusta, Me.	100	WSPR 1140 Springfield, Mass.	500
WOLS 1200 Florence, S. C.	100	WRDW 1500 Augusta, Ga.	100	WSUJ 880 Iowa City, Iowa	500
WOMI 1500 Owensboro, Ky.	100	WREC 600 Memphis, Tenn.	1000	WSUN 620 St. Petersburg, Fla.	1000
WOMT 1210 Manitowoc, Wis.	100	WREN 1220 Lawrence, Kans.	1000	WSVA 550 Harrisonburg, Va.	500
WOOD 1270 Grand Rapids, Mich.	500	WRGA 1500 Rome, Ga.	100	WSVS 1370 Buffalo, N. Y.	50
		WRJN 1370 Racine, Wis.	100	WSYB 1500 Rutland, Vt.	100

NORTH AMERICAN B. C. STATIONS BY CALLS

WSYR 570	1000	XEAG 1310	10	XEFV 1210	100
Syracuse, N. Y.		Cordoba, Ver.		Juarez, Chih.	
WTAD 900	1000	XEAL 660	1000	XEFW 1310	250
Quincy, Ill.		Mexico City, D. F.		Tampico, Tams.	
WTAG 580	1000	XEAM 750	25	XEH 720	250
Worcester, Mass.		Matamoros, Tams.		Monterrey, N. L.	
WTAL 1310	100	XEAO 660	250	XEI 1370	125
Tallahassee, Fla.		Mexicall, B. C.		Morelia, Mich.	
WTAM 1070	50000	XEAS 1160	50	XEJ 1020	1000
Cleveland, Ohio		Saltillo, Coah.		Juarez, Chih.	
WTAQ 1330	1000	XEAT 1210	250	XEJP 1130	100
Green Bay, Wis.		Parral, Chih.		Mexico City, D. F.	
WTAR 780	1000	XEAW 960	50000	XEK 990	100
Norfolk, Va.		Reynosa, Tams.		Mexico City, D. F.	
WTAW 1120	500	XEAY 1240	100	XEKL 1240	500
College Station, Tex.		Mexico City, D. F.		Leon, Guan.	
WTAX 1210	100	XEB 1030	10000	XEL 780	1000
Springfield, Ill.		Mexico City, D. F.		Mexico City, D. F.	
WTBO 800	250	XEBA 1080	20	XELA 1240	50
Cumberland, Md.		Guzman, Jal.		Saltillo, Coah.	
WTCN 1250	1000	XEBG 820	1000	XELO 1110	50000
Minneapolis, Minn.		Tijuana, B. Cta.		Tijuana, B. Cta.	
WTEL 1310	100	XEBH 930	500	XELZ 1370	100
Philadelphia, Pa.		Hermosillo, Sonora		Mexico City, D.F.	
WTHT 1200	100	XEBI 1000	25	XEMG 1060	100
Hartford, Conn.		Aguascalientes, Ags.		Atzacapotzalco, D. F.	
WTIC 1040	50000	XEBJ 1160	20	XEMO 860	5000
Hartford, Conn.		Merida, Yuc.		Tijuana, L. C.	
WTJS 1310	100	XEBK 1000	100	XEMX 1280	100
Jackson, Tenn.		Neuvo Laredo, Tams.		Mexico City, D. F.	
WTMJ 620	1000	XEBL 1220	50	XENC 860	50
Milwaukee, Wis.		Mazatlan, Sin.		Mexico City, D. F.	
WTMV 1500	100	XEBX 640	250	XENT 910	150000
East St. Louis, Ill.		Sabinas, Coah.		Nuevo Laredo, Tams.	
WTNJ 1280	500	XEBZ 1160	100	XEOK 760	2500
Trenton, N. J.		Mexico City, D. F.		Tijuana, L. C.	
WTOC 1260	1000	XEC 1150	100	XEP 1160	500
Savannah, Ga.		Tijuana, L. C.		Juarez, Chih.	
WTOL 1200	100	XECW 1310	10	XEPN 730	100000
Toledo, Ohio		Mexico City, D. F.		Piedras Negras, Coah.	
WTRC 1310	100	XECZ 1370	100	XERA 840	350000
Elkhart, Ind.		San Luis Potosi, S.L.P.		Villa Acuna, Coah.	
WVFW 1400	500	XED 1160	2500	XES 990	250
Brooklyn, N. Y.		Guadalajara, Jal.		Tampico, Tams.	
WWAE 1200	100	XEDA 1220	200	XET 690	5000
Hammond, Ind.		Gra. Anaya, D. F.		Monterrey, N. L.	
WWJ 920	5000	XEDF 810	75	XETB 1310	125
Detroit, Mich.		Nuevo Laredo, Tams.		Torreon, Coah.	
WWL 850	10000	XEDP 1080	500	XETF 1220	30
New Orleans, La.		Mexico City, D. F.		Veraacruz, Ver.	
WWNC 570	1000	XEDW 1150	20	XETH 1210	100
Asheville, N. C.		Minatitlan, Ver.		Puebla, Pue.	
WWRL 1500	100	XEE 1210	50	XEU 1010	250
Woodside, N. Y.		Durango, Dgo.		Veraacruz, Ver.	
WWSW 1500	100	XEF 1450	100	XEW 890	50000
Pittsburgh, Pa.		Juarez, Chih.		Mexico City, D. F.	
WWVA 1160	5000	XEFA 1180	500	XEX 1310	125
Wheeling, W. Va.		Tacuba, D. F.		Monterrey, N. L.	
WXYZ 1240	1000	XEFB 870	200	XEXB 1270	50
Detroit, Mich.		Monterrey, N. L.		Jalapa, Ver.	
W3XJ 1060	100	XEFC 550	100	XEXC 810	350
College Park, Md.		Merida, Yuc.		Aguascalientes, Ags.	
W8XO 700	500000	XEFE 980	150	XEXD 1340	350
Cincinnati, Ohio		Laredo, Tams.		Jalapa, Ver.	
XEAA 920	200	XEFI 1440	250	XEXH 1250	250
Mexicall, B. C.		Chihuahua, Chih.		San Luis Potosi, S.L.P.	
XEAC 980	250	XEFJ 1230	100	XEXS 1000	100
Tijuana, L. C.		Monterrey, N. L.		Portable in Mexico	
XEAD 1060	125	XEFO 940	5000	XEYO 940	500
Guadalajara, Jal.		Mexico City, D. F.		Mexico City, D. F.	
XEAF 990	750			XEZ 630	500
Nogales, Son.				Merida, Yuc.	

Microphonics

Mr. A. Lavoie, Box 4024, Montreal, P. Q., sends information on changes in frequency of several Canadian stations. Effective immediately, CKY Winnipeg moves from 910 to 760. CRCM Montreal changes from 910 to 1050. CRCK Quebec, 1050, goes to 950. CRCS Chicoutimi moves to 1120 from 950 kcs.

The new Vercheres, P. Q. 50 kw station will be CBF on 910 kcs. Broadcasting will commence soon.

Charles J. Correll, the Andy of NBC's Amos 'n' Andy, broadcasts the news that Miss Alyce McLaughlin, of Chicago and Hollywood, became his bride on Sept. 11, at Glendale, Calif. After a week-end honeymoon at Del Monte, near San Francisco, they flew back to Hollywood in time for the Amos 'n' Andy program on Monday, Sept. 13.

Jane Froman and Don Ross, stars on the Summer Jell-O program on NBC, were the principals in one of the first of the radio romances. They met in the studios of Station WLW, Cincinnati, where Miss Froman was a staff soloist. Ross at that time was a partner of Jack Brooks in a harmony act touring the movie circuits; in the course of their peregrinations they played Cincinnati and were invited to broadcast. Soon after his introduction to Jane, Ross dissolved his professional partnership with Brooks and entered into a matrimonial alliance with the lovely lark.

BEGINNINGS: Dr. Frank Black, NBC's general music director, began his musical career as boy so-

prano in the choir of a Philadelphia church. At ten he was playing piano in a nickelodeon . . . Lanny Ross was a student at Yale when he first broadcast as a member of the Jeddo Highlanders, a double quartet . . . Milton J. Cross, originally a church singer, was vocalist at a New York funeral parlor before becoming a broadcaster.

Memos on a Radio City reporter's pad: B. A. Rolfe and his orchestra are making movie shorts. . . . Walter O'Keefe is overwhelmed with written requests from listeners to appear as "Dramateurs" on Town Hall Tonight. His secretary is kept busy advising the applicants that the cast is selected at random from studio audiences and not before hand. . . . Thomas Bennett, composer and arranger who writes the music for the Eugene O'Neill plays, once was an interior decorator.

Heard in the NBC studios: Bob Burns and his new missus, the former Harriet Foster, are now residing in a handsome home the bazooka virtuoso recently bought in Bel Air, suburb of Los Angeles. . . . D'Artega, conductor of the Jane Froman-Don Ross program, has a trade as well as a profession. He is a practical printer, having learned typesetting while training as a tune-smith.

Hollywood NBC studio pick-ups: Johnny Trotter, conductor of the Kraft Music Hall orchestra, is a bachelor and likes to cook. . . . Henry Hunter, Irene Rich's leading man, served in the same capacity with Miss Rich in Chicago under his real name, Arthur Jacobsen. He became Henry Hunter when he went to Hollywood about a year ago.

At DEADLINE . . .

New Mexican Stations: XEMU Piedras Negras, Coah., 580 kcs; XEJW Mexico City, D. F., 870 kcs; XEBO Irapuato, Guan., 1280 kcs.

KELO Sioux Falls, S. Dak., and KMED Medford, Ore., have joined the National Red and Blue Networks.

Fort de France, Martinique, is coming in very well on 9690 kcs.

The San Salvador station is almost definitely identified as YSN on 11710 kcs.

Australian changes: 7ZL Hobart 600 kcs from 620. 3AR Melbourne now on 620. 4QN Clevedon now on 630. 5SE Mount Gambier now on 1340.

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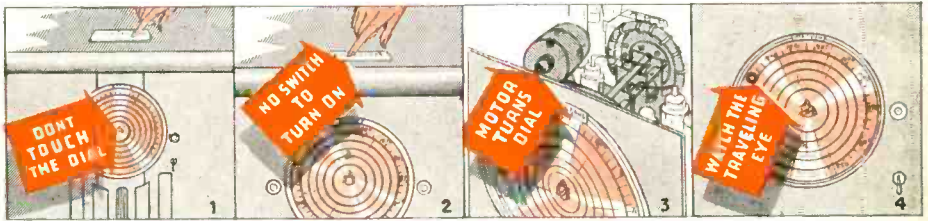
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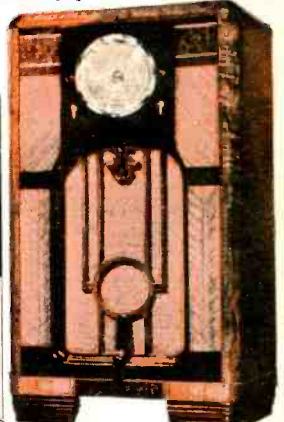
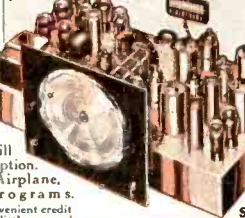
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